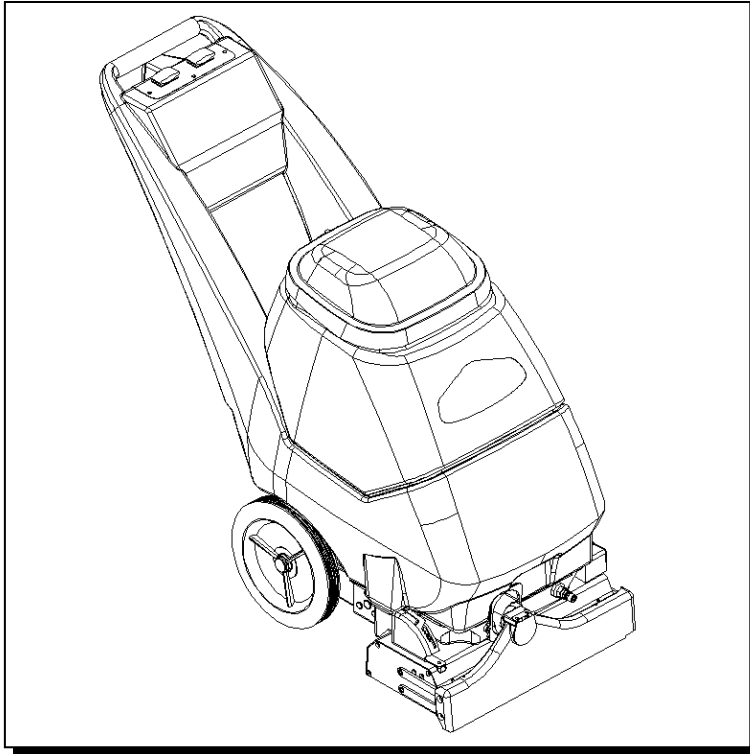


CARPET EXTRACTOR



Operating Instructions

MODEL: CDT7
10080220

QUEST® ... for Continuous Improvement.
Windsor's Quality Management System is Certified ISO 9001.



Read these instructions before operating the machine



MACHINE DATA LOG/OVERVIEW

Model: _____

Date of Purchase: _____

Serial Number: _____

Dealer: _____

Address: _____

Phone Number: _____

Sales Representative: _____

Warranty Registration

Thank you for purchasing a Windsor product. Warranty registration is quick and easy. Your registration will allow us to serve you better over the lifetime of the product.

To register your product go to:

www.windsorind.com/WarrantyRegistration.aspx

For customer assistance:

1-888-444-7654



TABLE OF CONTENTS

<i>Machine Data Log/Overview</i>	1
<i>Table of Contents</i>	2

HOW TO USE THIS MANUAL

<i>How to use this Manual</i>	1-1
-------------------------------------	-----

SAFETY

<i>Important Safety Instructions</i>	2-1
<i>Hazard Intensity Level</i>	2-2
<i>Grounding Instructions</i>	2-3

OPERATIONS

<i>Technical Specifications</i>	3-1
<i>Controls/Component Location</i>	3-2
<i>Filling Operation</i>	3-5
<i>Operations</i>	3-6
<i>Cleaning Procedure</i>	3-8
<i>Accessory Tool Usage</i>	3-10

MAINTENANCE

<i>Service Schedule</i>	4-1
<i>Periodic Maintenance</i>	4-2
<i>Daily/ Regular Maintenance</i>	4-2
<i>Vacuum Motor Replacement</i>	4-3
<i>Belt Replacement</i>	4-4
<i>Solution Pump Replacement</i>	4-5
<i>Wiring Diagram</i>	4-6
<i>Troubleshooting Chart</i>	4-7

GROUP PARTS LIST

<i>Frame Assembly</i>	5-1
<i>Brush Assembly</i>	5-3
<i>Pump Assembly(prior to SN)</i>	5-5
<i>Pump Assembly</i>	5-7
<i>Vacuum Shoe Assembly</i>	5-9
<i>Control Panel Assembly</i>	5-11
<i>Solution Tank Assembly</i>	5-13
<i>Recovery Tank Assembly</i>	5-15
<i>Suggested Spare Parts/Notes</i>	5-17

HOW TO USE THIS MANUAL

This manual contains the following sections:

- HOW TO USE THIS MANUAL
- SAFETY
- OPERATIONS
- MAINTENANCE
- PARTS LIST

The HOW TO USE THIS MANUAL section will tell you how to find important information for ordering correct repair parts.

Parts may be ordered from authorized dealers. When placing an order for parts, the machine model and machine serial number are important. Refer to the MACHINE DATA box which is filled out during the installation of your machine. The MACHINE DATA box is located on the inside of the front cover of this manual.

Model: _____
Date of Purchase: _____
Serial Number: _____
Dealer: _____
Address: _____
Phone Number: _____
Sales Representative: _____

The model and serial number of your machine is on the bottom back-end of the machine.

The SAFETY section contains important information regarding hazard or unsafe practices of the machine. Levels of hazards is identified that could result in product or personal injury, or severe injury resulting in death.

The OPERATIONS section is to familiarize the operator with the operation and function of the machine.

The MAINTENANCE section contains preventive maintenance to keep the machine and its components in good working condition. They are listed in this general order:

- Periodic
- Daily/Regular
- Troubleshooting

The PARTS LIST section contains assembled parts illustrations and corresponding parts list. The parts lists include a number of columns of information:

- **REF** – column refers to the reference number on the parts illustration.
- **PART NO.** – column lists the part number for the part.
- **PRV NO.** - reference number.
- **QTY** – column lists the quantity of the part used in that area of the machine.
- **DESCRIPTION** – column is a brief description of the part.
- **SERIAL NO. FROM** – column indicates the first machine the part number is applicable to. When the machine design has changed, this column will indicate serial number of applicable machine. The main illustration shows the most current design of the machine. The boxed illustrations show older designs. If column has an asterisk (*), call manufacturer for serial number.
- **NOTES** – column for information not noted by the other columns.

NOTE: If a service or option kit is installed on your machine, be sure to keep the KIT INSTRUCTIONS which came with the kit. It contains replacement parts numbers needed for ordering future parts.

NOTE: The number on the lower left corner of the front cover is the part number for this manual.

IMPORTANT SAFETY INSTRUCTIONS
When using an electrical appliance, basic precaution must always be followed, including the following:

READ ALL INSTRUCTIONS BEFORE USING THIS MACHINE.
This machine is for commercial use.

⚠ WARNING: To reduce the risk of fire, electric shock, or injury:

Connect to a **properly grounded outlet**. See Grounding Instructions.

Do not leave the machine unattended. Unplug machine from outlet when not in use and before maintenance or service.

Use only indoors. Do not use outdoors or expose to rain.

Do not allow machine to be used as a toy. **Close attention** is necessary when used by or near children.

Use only as described in this manual. Use only manufacturer's recommended components and attachments.

Do not use damaged electrical cord or plug. Follow all instructions in this manual concerning grounding the machine. If the machine is **not working properly**, has been dropped, damaged, left outdoors, or dropped into water, return it to an authorized service center.

Do not pull or carry machine by electrical cord, use as a handle, close a door on cord, or pull cord around sharp edges or corners.

Do not run machine over cord. **Keep** cord away from heated surfaces.

Do not unplug machine by pulling on cord. To unplug, grasp the electrical plug, not the electrical cord.

Do not handle the electrical plug or machine with wet hands.

Do not operate the machine with any openings blocked. Keep openings free of debris that may reduce airflow.

This machine is intended for cleaning carpet only.

Do not vacuum anything that is burning or smoking, such as cigarettes, matches, or hot ashes.

This machine is not suitable for picking up health endangering dust.

Turn off all controls before unplugging.

Machine can cause a fire when operating near flammable vapors or materials. Do not operate this machine near flammable fluids, dust or vapors.

This machine is suitable for commercial use, for example in hotels, schools, hospitals, factories, shops and offices for more than normal housekeeping purposes.

Maintenance and repairs must be done by qualified personnel.

If foam or liquid comes out of machine, switch off immediately.

SAVE THESE INSTRUCTIONS

SÛRETÉ

IMPORTANTES MESURES DE SÉCURITÉ

L'utilisation d'un appareil électrique demande certaines précautions:
LIRE TOUTES LES INSTRUCTIONS AVANT DE FAIRE FONCTIONNER (CET APPAREIL).



Pour réduire les risques d'incendie, de choc électrique ou de blessure:

Cet appareil ne doit être connecté qu'à des prises ayant une sortie de terre.

Ne pas laisser l'appareil sans surveillance lorsqu'il est branché. Débrancher lorsque l'appareil n'est pas utilisé et avant l'entretien.

Pour réduire les risques de choc électrique, ne pas utiliser à l'extérieur et ne pas aspirer de matières humides.

Ne pas permettre aux enfants de jouer avec l'appareil. Une attention particulière est nécessaire lorsque l'appareil est utilisé par des enfants ou à proximité de ces derniers.

N'utiliser que conformément à cette notice avec les accessoires recommandés par le fabricant.

Ne pas utiliser si le cordon ou la fiche est endommagé. Retourner l'appareil à un atelier de réparation s'il ne fonctionne pas bien, s'il est tombé ou s'il a été endommagé, oublié à l'extérieur ou immergé.

Ne pas tirer, soulever ou traîner l'appareil par le cordon. Ne pas utiliser le cordon comme une poignée, le coincer dans l'embrasure d'une porte ou l'appuyer contre des arêtes vives ou des coins. Ne pas faire rouler l'appareil sur le cordon.

Garder le cordon à l'écart des surfaces chaudes.

Ne pas débrancher en tirant sur le cordon. Tirer plutôt la fiche.

Ne pas toucher la fiche ou l'appareil lorsque vos mains sont humides.

N'insérer aucun objet dans les ouvertures. Ne pas utiliser l'appareil lorsqu'une ouverture est bloquée. S'assurer que de la poussière, de la peluche, des cheveux ou d'autres matières ne réduisent pas le débit d'air.

Tenga especial cuidado al manejar la aspiradora en una escalera.

Ne pas aspirer de matières en combustion ou qui dégagent de la fumée, comme des cigarettes, des allumettes ou des cendres chaudes.

Cette machine **n'est pas** adaptée au ramassage de poussières dangereuses.

Mettre toutes les commandes à la position ARRÊT avant de débrancher l'appareil.

Ne pas aspirer des liquides inflammables ou combustibles, comme de l'essence, et ne pas faire fonctionner dans des endroits où peuvent se trouver de tels liquides.

Cette machine est destinée à un usage commercial. Elle est recommandée davantage pour les domaines hôtelier, scolaire, hospitalier, industriel ou pour les bureaux, les chaînes de magasin, que pour un usage domestique normal.

L'entretien et les réparations de la machine **doivent être effectuées** par un personnel qualifié.

Si de la mousse ou du liquide sort de la machine, **la mettre hors tension immédiatement.**

CONSERVER CES INSTRUCTIONS

CADET 86038220

HAZARD INTENSITY LEVEL

The following symbols are used throughout this guide as indicated in their descriptions:

HAZARD INTENSITY LEVEL

There are three levels of hazard intensity identified by signal words -**WARNING** and **CAUTION** and **FOR SAFETY**. The level of hazard intensity is determined by the following definitions:



WARNING - Hazards or unsafe practices which COULD result in severe personal injury or death.



CAUTION - Hazards or unsafe practices which could result in minor personal injury or product or property damage.

FOR SAFETY: To Identify actions which must be followed for safe operation of equipment.

Report machine damage or faulty operation immediately. Do not use the machine if it is not in proper operating condition. Following is information that signals some potentially dangerous conditions to the operator or the equipment. Read this information carefully. Know when these conditions can exist. Locate all safety devices on the machine. Please take the necessary steps to train the machine operating personnel.

FOR SAFETY:

DO NOT OPERATE MACHINE:

Unless Trained and Authorized.

Unless Operation Guide is Read and understood.

In Flammable or Explosive areas.

In areas with possible falling objects.

WHEN SERVICING MACHINE:

Avoid moving parts. Do not wear loose clothing; jackets, shirts, or sleeves when working on the machine. Use manufacturer approved replacement parts.

DEGRÉS DE RISQUES EN CAS DE DANGER

Les symboles ci-dessous sont utilisés à travers ce manuel comme illustré dans leurs descriptions :

DEGRÉS DE RISQUES EN CAS DE DANGER

Il existe trois degrés de risques identifiés par les termes signalétiques –**AVERTISSEMENT** et **ATTENTION** et **POUR VOTRE SÉCURITÉ**. Le degré de risque est défini de la manière suivante :

▲ AVERTISSEMENT:

AVERTISSEMENT - Dangers ou méthodes dangereuses qui **POURRAIENT** provoquer de graves blessures ou entraîner la mort.

▲ ATTENTION:

ATTENTION - Dangers ou méthodes dangereuses qui pourraient provoquer des blessures légères ou une détérioration du produit ou des biens immobiliers.

POUR VOTRE SÉCURITÉ : ce signe permet d'identifier les mesures de précaution à prendre pour assurer un bon fonctionnement du matériel.

Rendre compte immédiatement d'une défaillance ou d'une détérioration de la machine. Ne pas utiliser la machine si celle-ci ne fonctionne pas correctement. Lire soigneusement les informations ci-dessous signalant certains dangers potentiels pour l'opérateur de la machine. L'opérateur doit être absolument au courant de ces dangers potentiels. Localiser tous les dispositifs de sécurité sur la machine. Il est conseillé de prendre les mesures nécessaires pour former le personnel opérateur.

POUR VOTRE SÉCURITÉ :

NE PAS MANOEUVRER LA MACHINE :

Lorsqu'on n'est pas expérimenté ou qualifié.

Lorsque le guide d'utilisation n'est pas été lu ou compris.

Dans des zones inflammables ou explosives.

Dans des zones où des objets peuvent tomber.

LORS DE L'ENTRETIEN DE LA MACHINE :

Éviter les parties amovibles. Ne pas porter de vêtements amples, tels que des vestes, des chemises ou des vêtements avec manches lors de l'utilisation de la machine. Utiliser les pièces détachées Windsor homologuées.

GROUNDING INSTRUCTIONS

ELECTRICAL:

In the USA, this machine operates on a standard 15 amp 115V, 60 Hz, A.C. power circuit. The amp, hertz, and voltage are listed on the data label found on each machine. Using voltages above or below those indicated on the data label will cause serious damage to the motors.

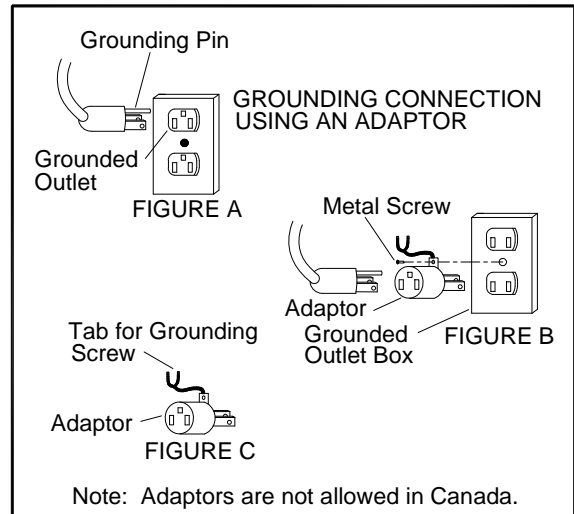
EXTENSION CORDS:

If an extension cord is used, the wire size must be at least one size larger than the power cord on the machine, and must be limited to 50 feet (15.5m) in length.

GROUNDING INSTRUCTIONS:

This appliance must be grounded. If it should malfunction or break down, grounding provides a path of least resistance for electric current to reduce the risk of electric shock. This appliance is equipped with a cord having an equipment-grounding conductor and grounding plug. The plug must be inserted into an appropriate outlet that is properly installed and grounded in accordance with all local codes and ordinances.

This appliance is for use on a nominal 120-volt circuit, and has a grounded plug that looks like the plug in "Fig. A". A temporary adaptor that looks like the adaptor in "Fig. C" may be used to connect this plug to a 2-pole receptacle as shown in "Fig. B", if a properly grounded outlet is not available. The temporary adaptor should be used only until a properly grounded outlet (Fig. A) can be installed by a qualified electrician. The green colored rigid ear, lug, or wire extending from the adaptor must be connected to a permanent ground such as a properly grounded outlet box cover. Whenever the adaptor is used, it must be held in place by a metal screw.



⚠ WARNING:

Improper connection of the equipment-grounding conductor can result in a risk of electric shock. Check with a qualified electrician or service person if you are in doubt as to whether the outlet is properly grounded. Do not modify the plug provided with the appliance - if it will not fit the outlet; have a proper outlet installed by a qualified electrician.

⚠ AVERTISSEMENT:

Le raccordement incorrect du conducteur de terre d'équipement peut entraîner des risques d'électrocution. Vérifiez auprès d'un électricien qualifié ou d'un responsable de l'entretien si vous avez quelque doute que ce soit quant au raccordement à la terre de votre prise murale. Ne modifiez pas la fiche fournie avec l'appareil : si elle ne correspond pas à la prise murale, faites installer une prise adéquate par un électricien qualifié. Utilisez-le uniquement sur des réceptacles protégés GFCI.

TECHNICAL SPECIFICATIONS

POWER TYPE

ELECTRICAL: 115 V, 15 A, 60 HZ

ELECTRIC VACUUM MOTOR: (1) –3 stage, 1.5 hp, 100 cfm (2.80 cubic meters/min.) Waterlift –120" (304 cm)

BRUSH: (1) 15" (38.1 cm.)

SOLUTION PUMP: 90 PSI, Diaphragm style, internal bypass

SOLUTION CAPACITY: 7 gallons (26.5ltr)

RECOVERY CAPACITY: 7 gallons (26.5ltr)

BRUSH SPEED: 1000 rpm

GENERAL DIMENSIONS/WEIGHT

Vacuum shoe: 17" (43.18 cm) cast aluminum with spring loaded down pressure

WHEELS: (2) 10" dia. (25 cm) wheels by 2"

WEIGHT: 92lbs. (42kg)

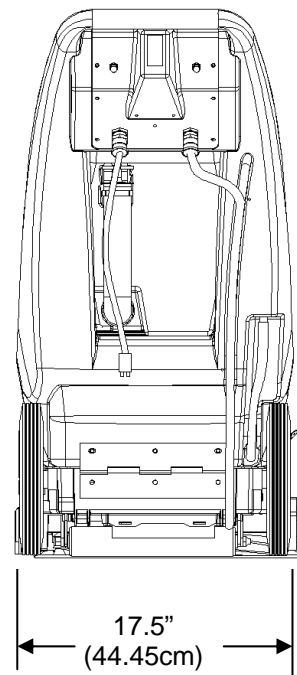
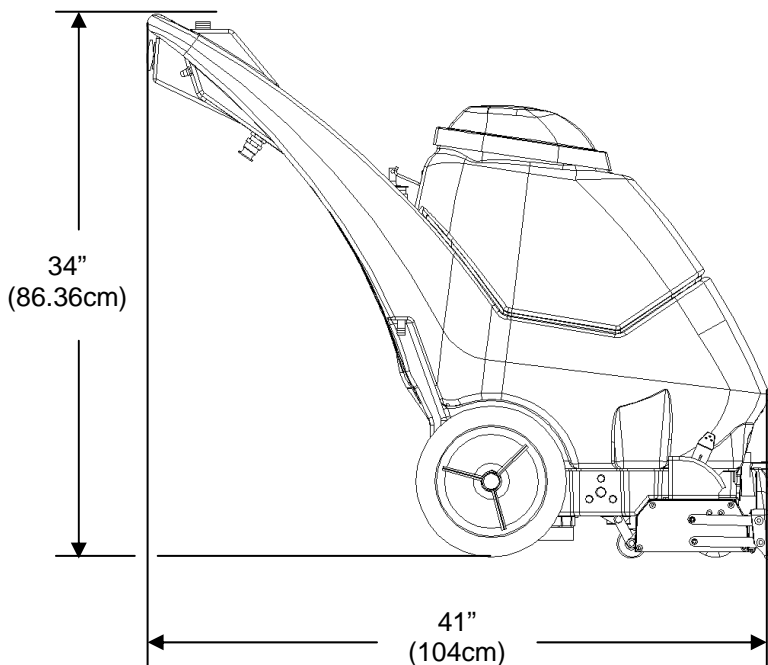
LENGTH: 41" (104 cm)

HEIGHT: 34" (86.36 cm)

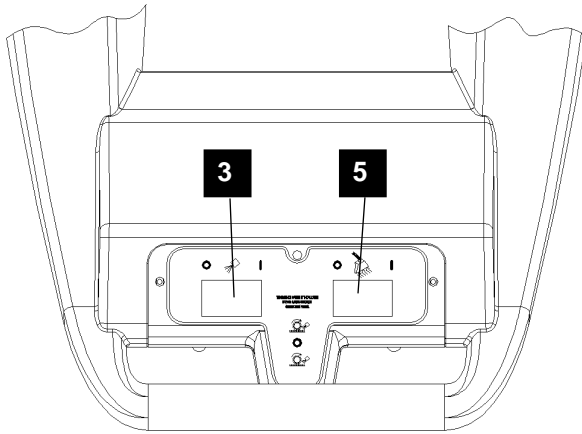
WIDTH: 17.5" (44.45 cm)

SOLUTION SPRAY: 2 quick change jets.

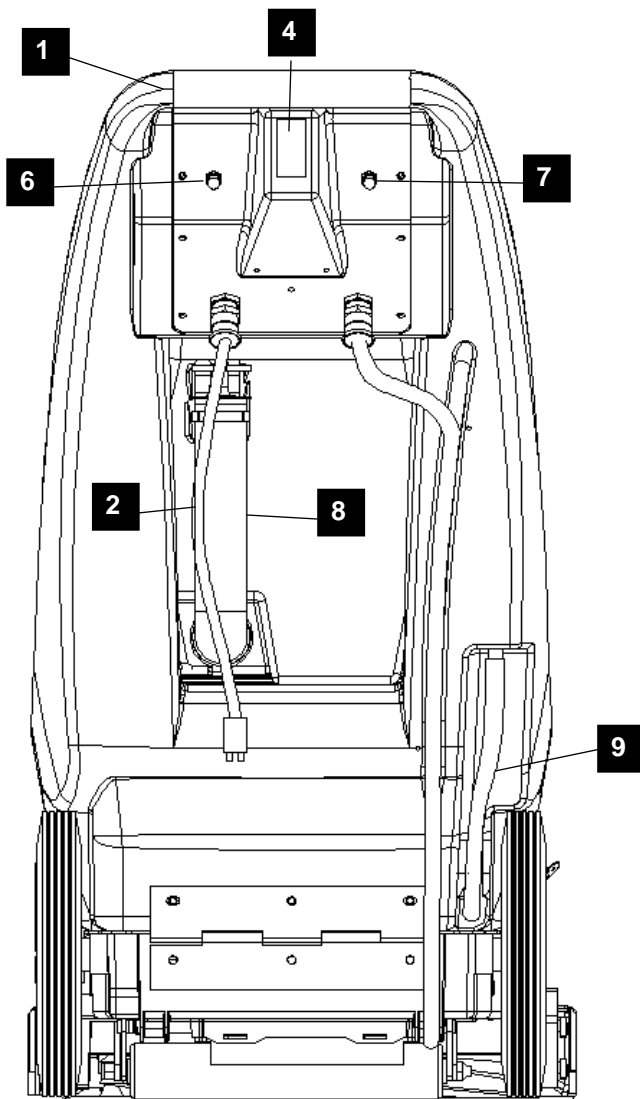
POWER CABLE: 50' (12.7 m) (14 gauge)



CONTROLS/COMPONENT LOCATIONS

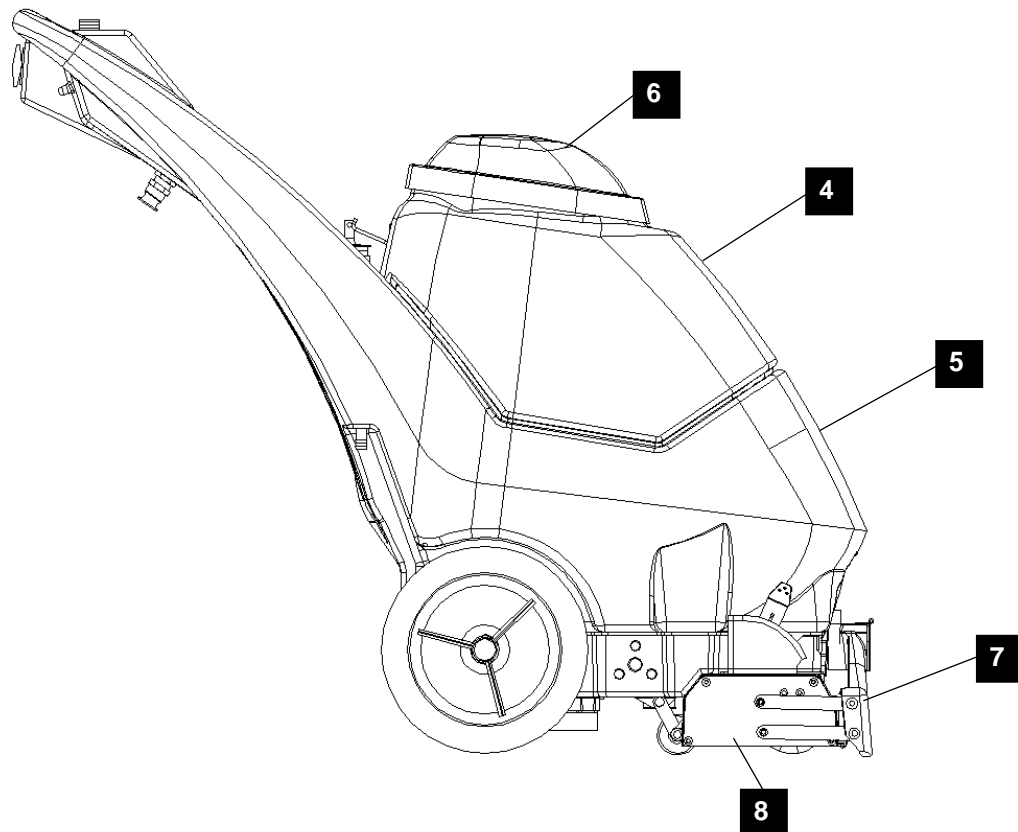
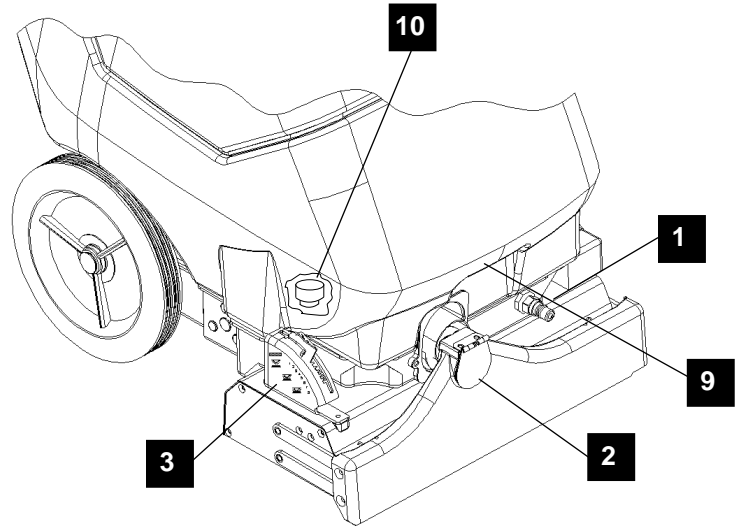


1. **Main Handle.** Used to pull and maneuver machine.
2. **Electrical Cord.**
3. **Pump Switch.** Turns on pump and enables spray.
4. **Brush/Spray switch.** Turns on brush motor and activates electro-valve to dispense solution to floor through jets. Intermittent, off, and continuous settings.
5. **Vacuum Motor Switch.** Turns on vacuum motor
6. **Brush Motor Circuit Breaker.** 6 amp. Breaker protecting brush motor.
7. **Vacuum Motor Circuit Breaker.** 15 amp. Breaker protecting vacuum motor.
8. **Recovery Dump Hose.** Facilitates draining dirty cleaning solution.
9. **Solution Dump Hose.** Facilitates draining excess cleaning solution from solution tank.



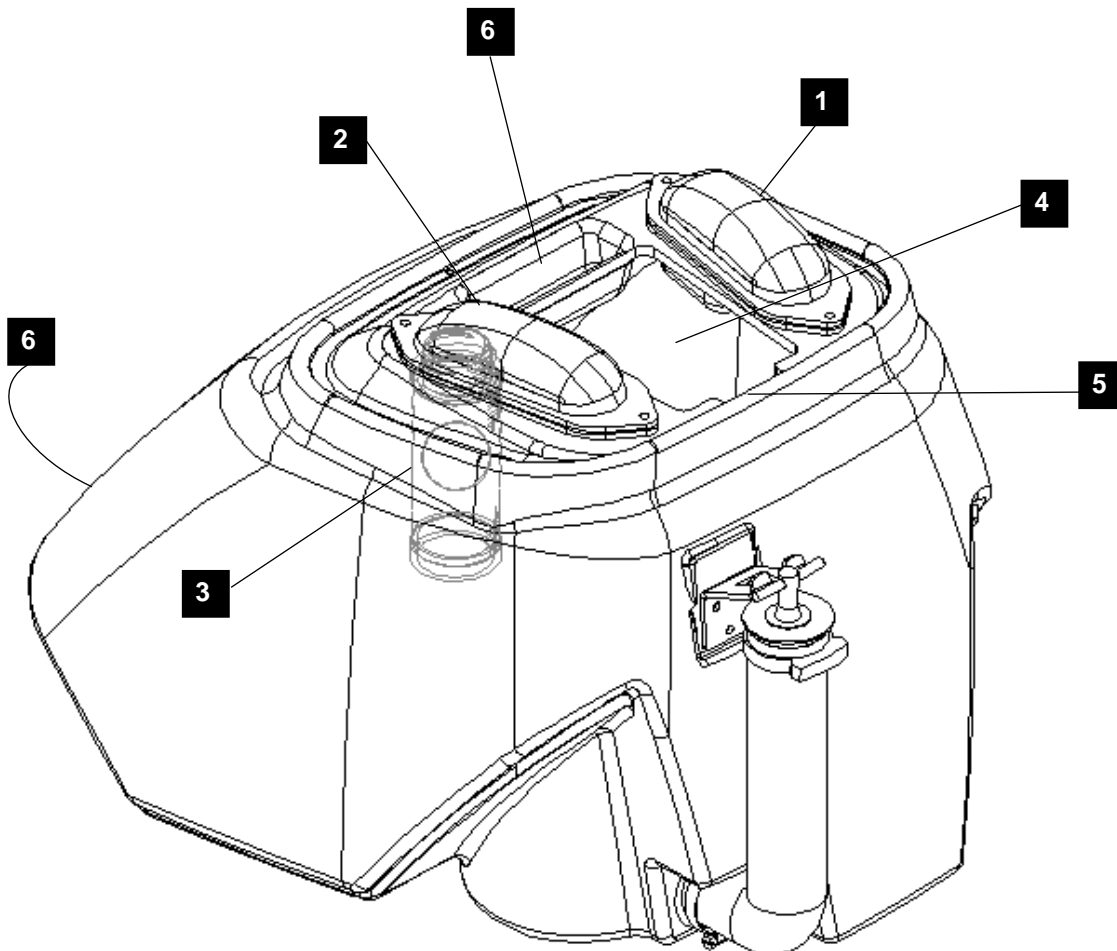
CONTROLS/COMPONENT LOCATIONS

1. **Solution Accessory Tool Hookup.** Used for various auxiliary cleaning tools.
2. **Vacuum Hose Door.** Used to connect various auxiliary 1 ½ inch cleaning tool vacuum hoses.
3. **Brush Height Adjustment.** Used to regulate brush height from storage position to various carpet heights.
4. **Recovery Tank.** Used to collect dirty cleaning solution.
5. **Solution Tank.** Used to hold cleaning solution.
6. **Recovery Tank Dome.**
7. **Vacuum Shoe.**
8. **Brush Housing.**
9. **Front Lifting Handle.**
10. **Cleaning Solution Filter.**

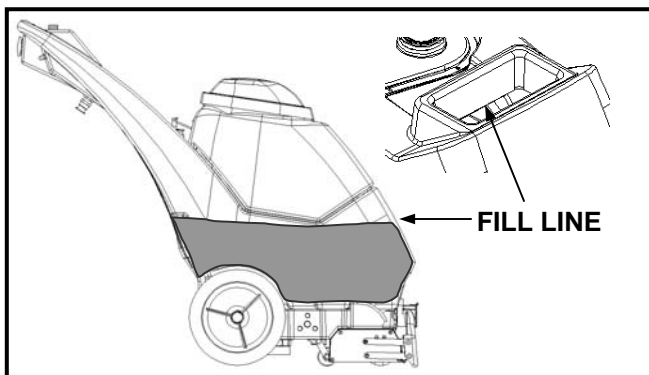
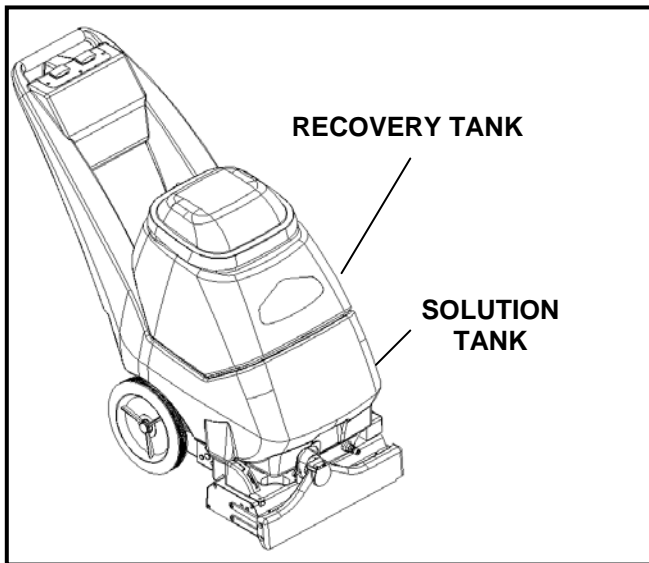


CONTROLS/COMPONENT LOCATIONS

1. Solution Intake Cover.
2. Vacuum Intake Cover.
3. Float Shut-Off.
4. Clean-Out Opening.
5. Pour Spout.
6. Lift Handle.



FILLING OPERATIONS



FILLING THE CADET

NOTE: Use clean bucket of water to fill solution tank

Do not put defoamer, solvents, spotter or prespray chemicals in the solution tank.

Do not allow water to spill into vacuum motor inlet. Dry spillage from top of solution tank before replacing recovery tank.

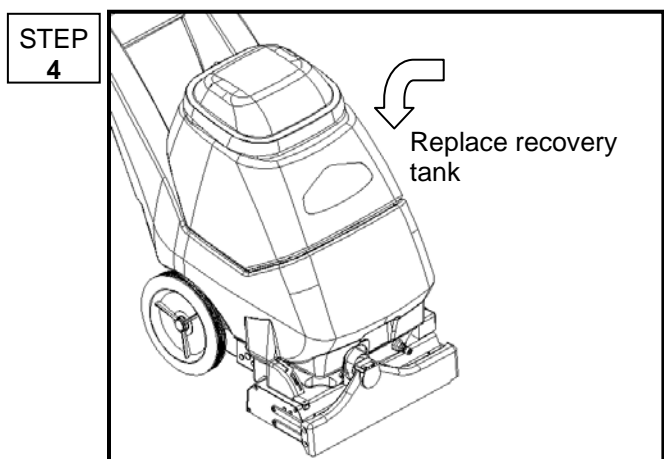
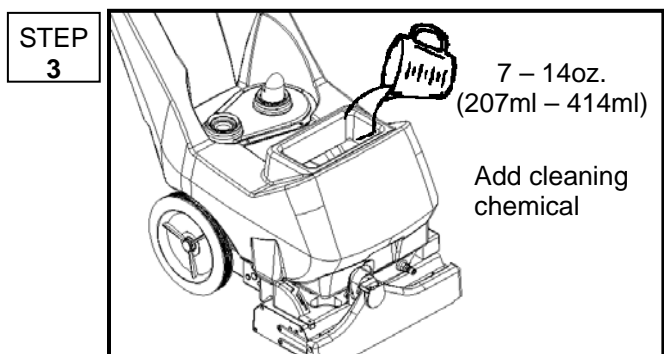
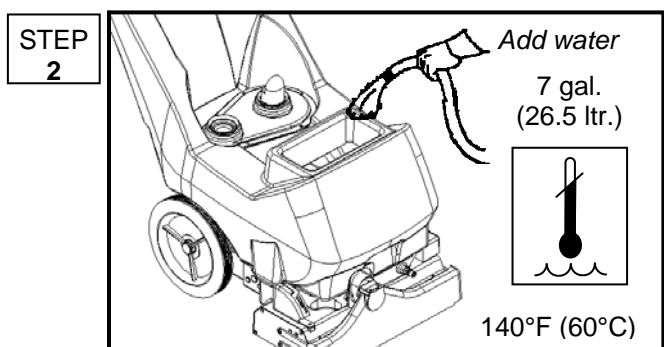
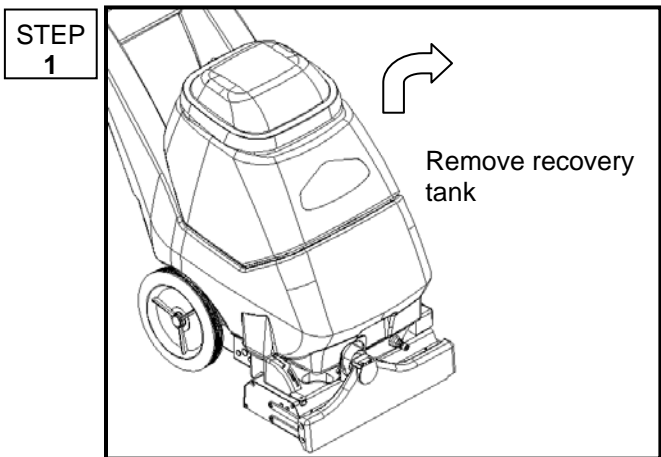
CHEMICALS

Suitable Chemicals

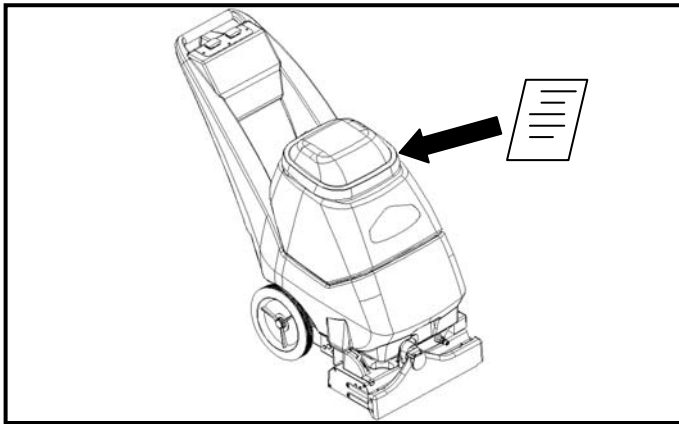
Alkalis
Detergents
Hydroxides
Soaps
Vinegar

Non-Compatible Chemicals

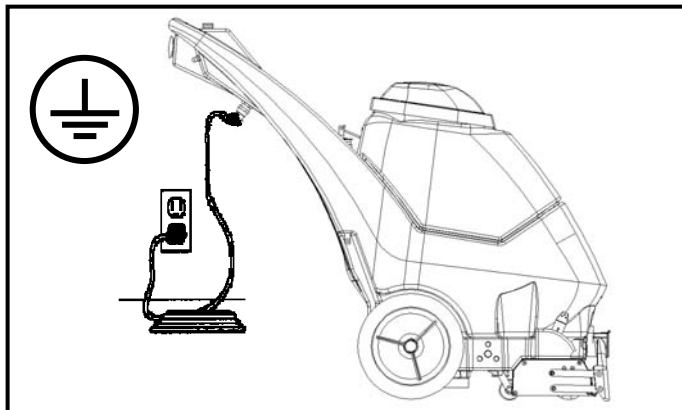
Aldehydes
Aromatic Hydrocarbons
SP Butyls
Carbon Tetrachloride
Clorox*
Chlorinated Bleaches
Chlorinated Hydrocarbons
Lysol*
Methyl Ethel Ketone (MEK)
Perchorethylene (perc)
Phenolics
Trichlorethylene
D-Limonene



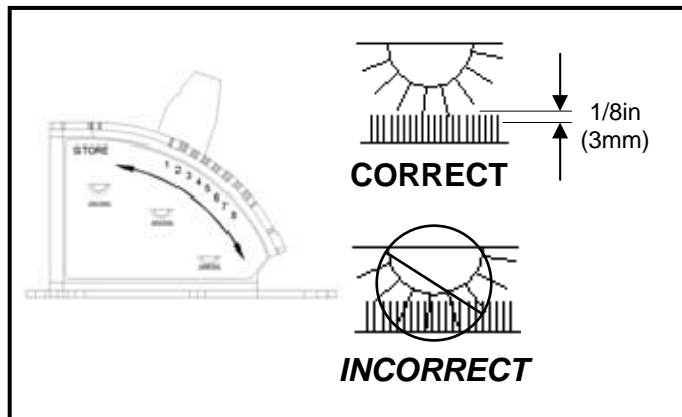
OPERATIONS



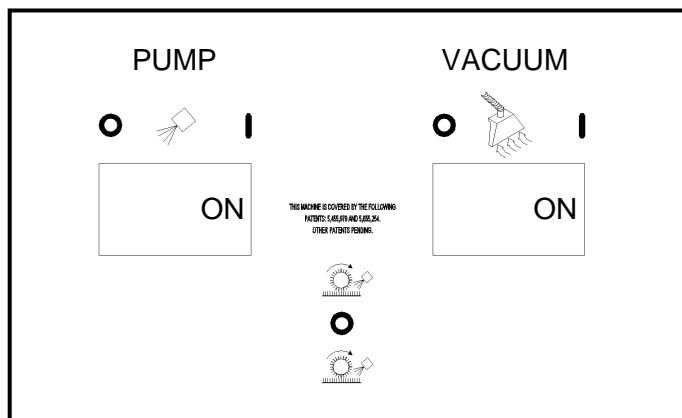
STEP 1 Remove literature from recovery tank. Fill solution tank (see filling operations, page3-5).



STEP 2 Plug cord into grounded outlet.
Note: Be sure dome is seated on recovery tank, and float shut-off is installed correctly.



STEP 3 Adjust brush to proper setting.
Note: For good operation the brush must skim the carpet. If circuit breaker trips raise brush to prevent damage to motor or carpet.

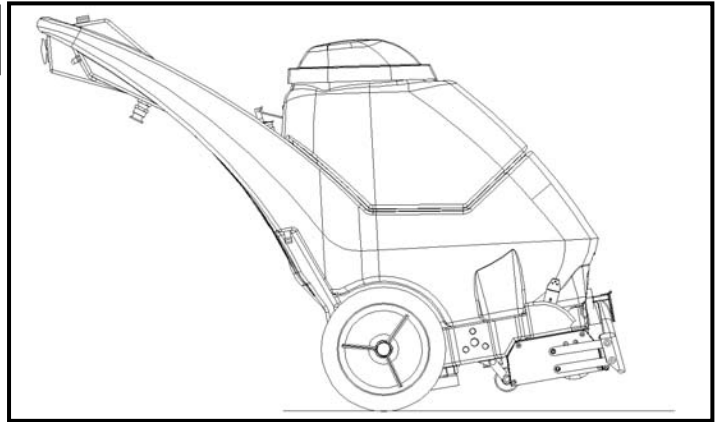


STEP 4 Turn on both Vacuum and Pump motor switches (“ON”=“I”).

OPERATIONS

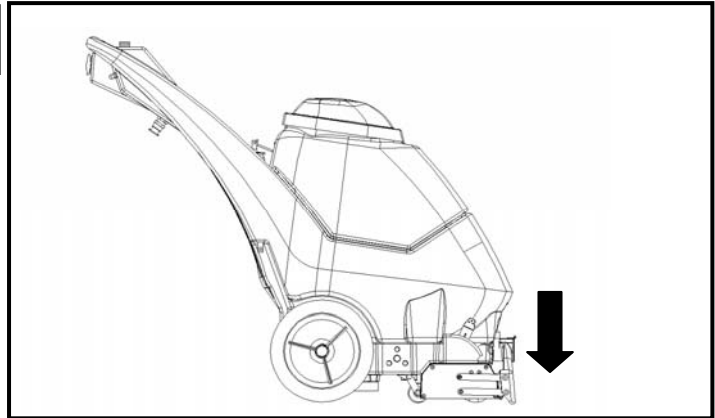
Tip machine back by main handle to move to starting point.

STEP
5



Lower machine to floor.

STEP
6

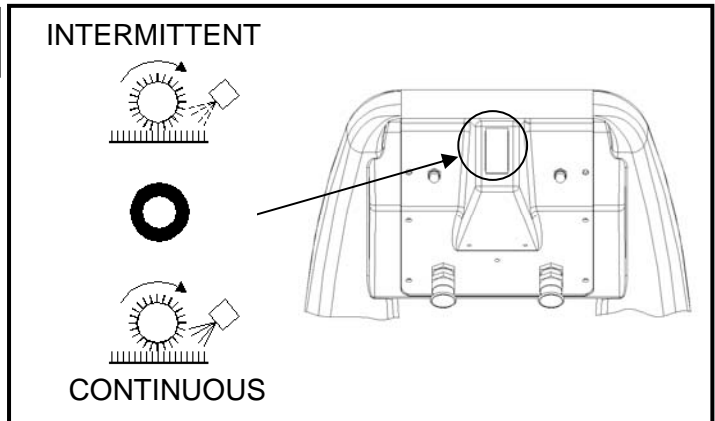


Select intermittent or continuous switch setting to turn on brush and start solution spray.

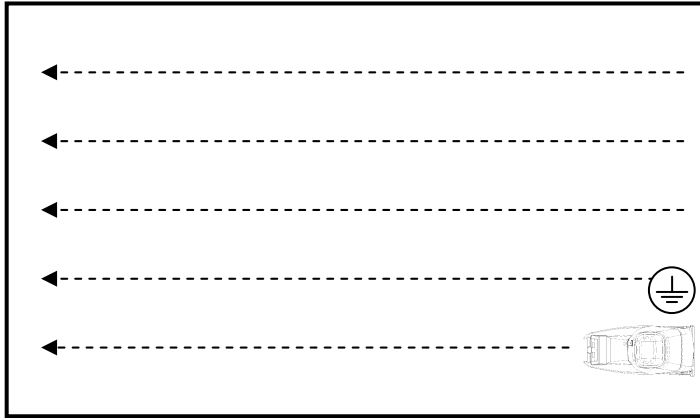
The intermittent setting requires the operator to hold the switch in the “on” position with the thumb, and is typically used in small areas where short cleaning passes are made.

The continuous setting allows the operator to set the switch in the “on” position with one touch, and is typically used in large areas where long cleaning passes are made.

STEP
7

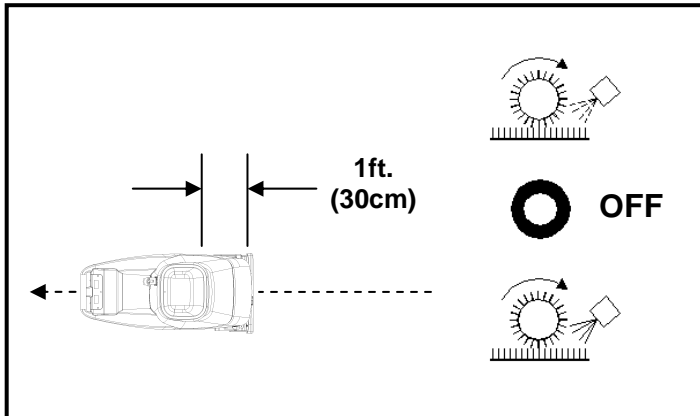


CLEANING PROCEDURE



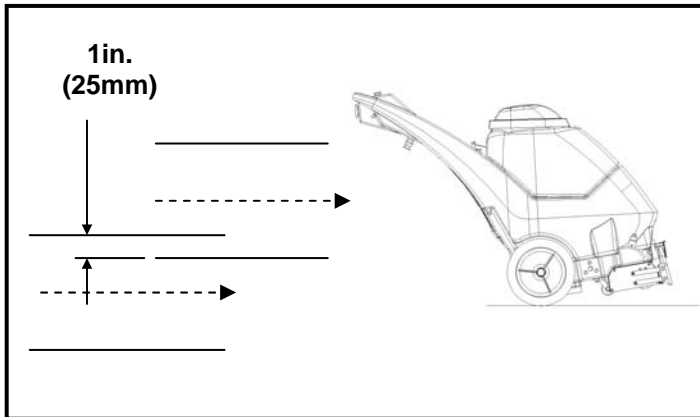
STEP
1

Start at wall closest to power outlet. Pull straight back without pushing down on handle.



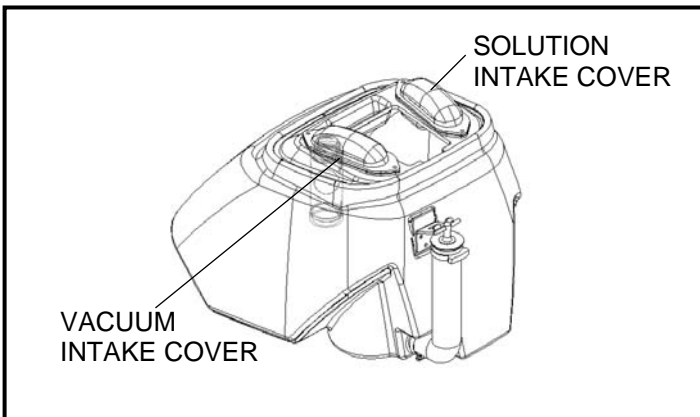
STEP
2

Release intermittent setting or turn off continuous setting on brush/spray switch approximately 1 foot before ending cleaning pass.



STEP
3

Push down on handle to raise vacuum shoe and brush before moving to the next cleaning pass. Overlap brush contact area approximately 1inch.



STEP
4

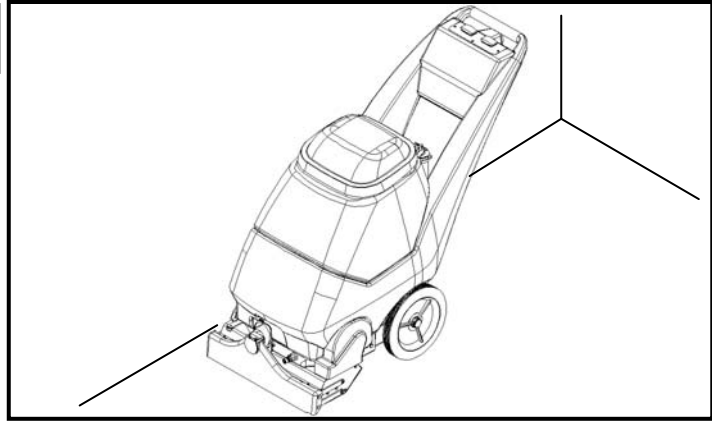
During operation, observe the following: The Cadet is equipped with clear internal covers to facilitate operator viewing of dirty solution and vacuum air flow.

During operation, observe the vacuum intake cover. Large amounts of water or foam entering the vacuum system can damage the vacuum motor. If you notice either condition, **shut down the machine immediately**. Empty recovery tank and/or add defoamer to recovery tank.

CLEANING PROCEDURE

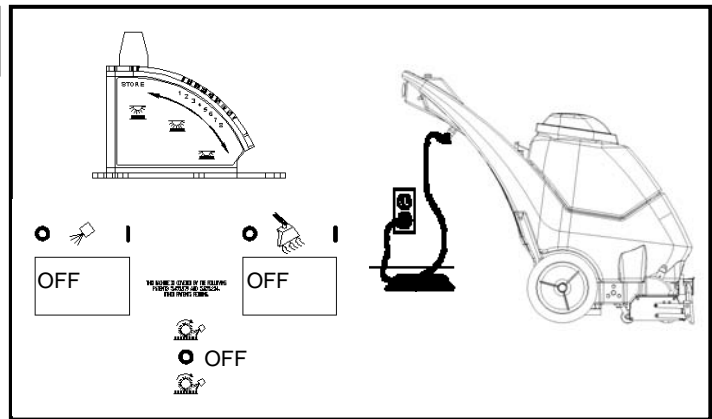
STEP
5

Use right side of machine for cleaning against walls.



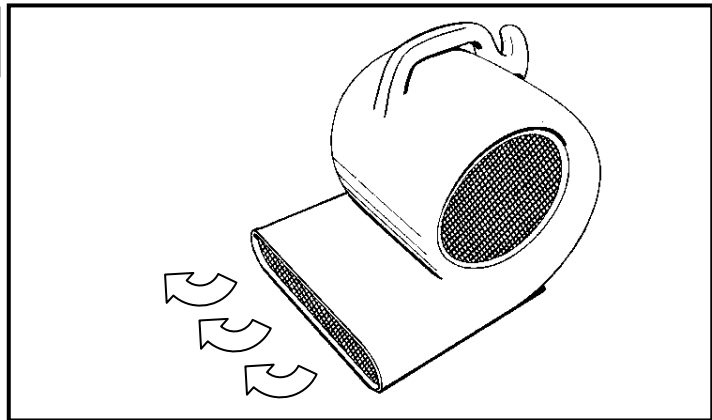
STEP
6

After cleaning, turn off all controls, return brush to storage position and carefully unplug machine.



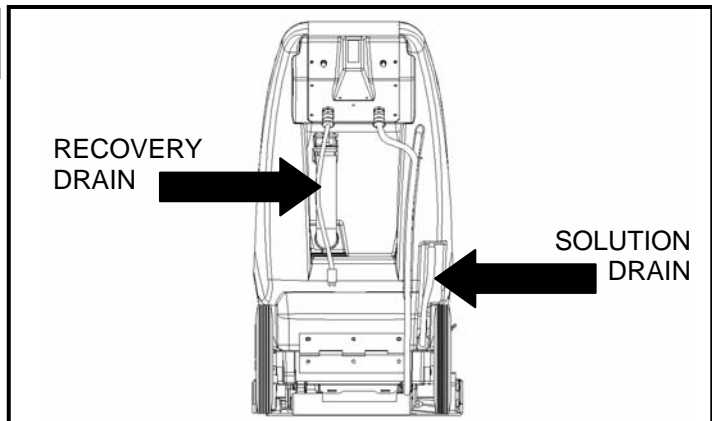
STEP
7

To speed drying, use a Windblower™ fan.

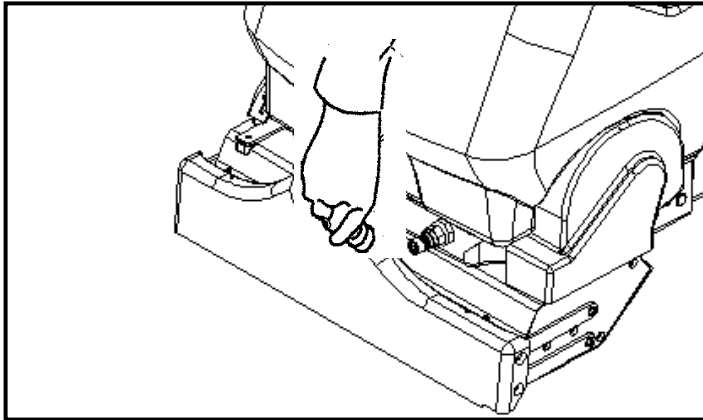


STEP
8

Empty recovery tank by releasing dump hose. Use a hose with cold water to clean out the recovery tank. Also drain solution tank after each use.



ACCESSORY TOOL USAGE

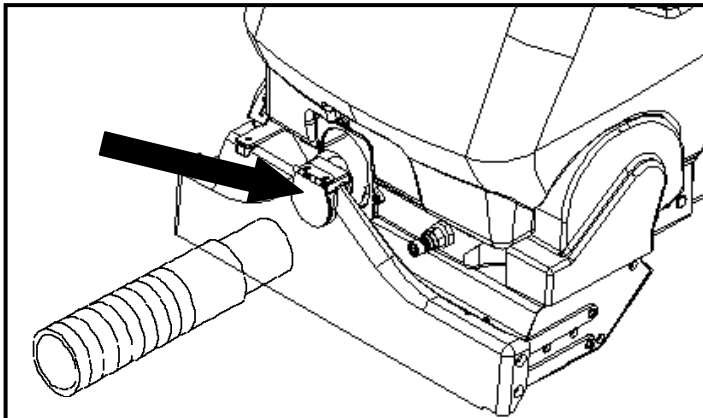


STEP
1

Use only one of the following acceptable accessory tools.

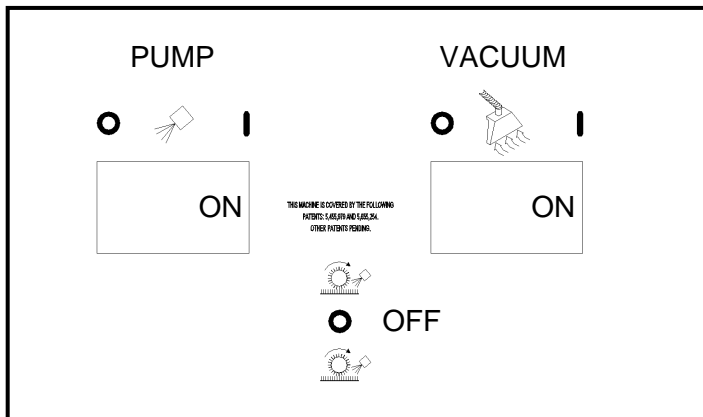
HT – 86000610 PRV NO. 89227
DDH – 8600060 PRV NO. 89226
DH – 86031540 PRV NO. 39504

Pull back collar and insert over machine mounted fitting, then release collar to lock into place.



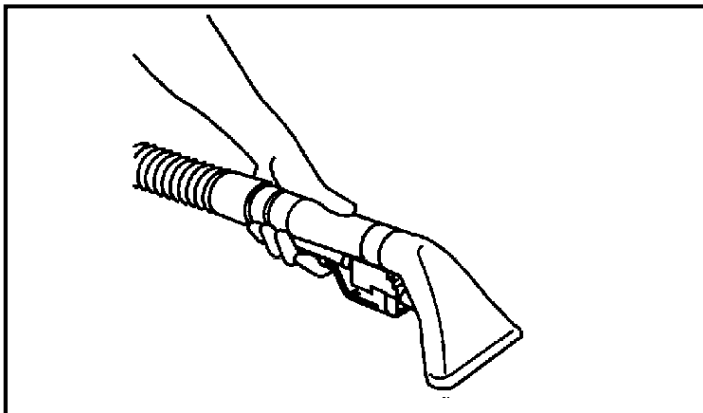
STEP
2

Lift door on front of vacuum shoe and insert 1 ½ inch hose cuff into hole.



STEP
3

Turn on Pump and Vacuum Switch. *Note: Be sure intermittent/continuous switch is in center (off) position and brush is in storage position.*



STEP
4

Squeeze handle on accessory tool to begin cleaning.

MAINTENANCE

SERVICE SCHEDULE

MAINTENANCE	DAILY	WEEKLY	QUARTERLY
Check machine for cord damage	*		
Check recovery dome and gasket for damage and cleanliness	*		
Check brush – should be clean with no lint or strings attached	*		
Inspect vac shoe for blockage; remove fibers with coat hanger, etc.	*		
Check hoses for wear, blockages, or damage	*		
Check handles, switches, and knobs for damage	*		
Check vac motor intake filter and clean	*		
Run one gallon of water through system	*		
Clean out recovery tank and check float valve to make sure it moves freely	*		
Clean out solution tank and remove and clean vacuum intake screen	*		
Clean outside of all tanks and check for damage	*		
Run vac motor for at least one minute to allow motor to dry	*		
Store with dome off tank to allow the tank to dry	*		
Check all bearings for noise		*	
Check all gaskets for wear and leakage		*	
Check vacuum intake screen for damage; replace if necessary		*	
Check pump pressure; observe spray pattern and check with gauge if necessary		*	
Check and clean solution screen		*	
Check belts for wear and replace as necessary		*	
Check brush for wear; ensure bristles are not damaged		*	
Check cables for fraying		*	
Check the spray bar (manifold) for damage; replace if broken or bent		*	
Check condition of vac shoe and frame for damage		*	
Check overall performance of machine		*	
Check vac motor carbon brushes			*

PERIODIC MAINTENANCE

Twice a month, flush a white vinegar solution (One quart vinegar to two gallons of water) or anti-browning solution (mixed as directed) through the extractor. This will prevent build-up of alkaline residue in the system. If spray jets become clogged, remove the spray tips, wash them thoroughly, and blow-dry.

NOTE: Do not use pins, wire, etc. to clean nozzles as this could destroy spray pattern.

Periodically inspect all hoses, electrical cables and connections on your machine. Frayed or cracked hoses should be repaired or replaced to eliminate vacuum or solution pressure loss. If the cable insulation is broken or frayed, repair or replace it immediately. Don't take chances with electrical fire or shock.

DAILY / REGULAR MAINTENANCE

Before making any adjustments or repairs to the machine, disconnect the power cord from electrical source.

1. Empty unused cleaning solution from the solution tank.
2. Inspect and clean filter screen in solution tank.
3. Flush pumping system with 4 or 7 liters of clean, hot water.
4. After each use, rinse tank with fresh water. Periodically inspect the recovery tank and decontaminate if necessary, using a Hospital Grade Virucide or a 1-10 bleach to water solution. Waste water should be disposed of properly.
5. Check for and remove any lint or debris around vac shoe.
6. Check spray jets for full spray pattern.

7. Remove lint and dirt build-up from brush and housing.
NOTE: Brush removal.
 - A. To remove brush, grab and pull brush out from end opposite drive belt (operator's right). Remove other end from brush driver.
 - B. To install brush, line up slots in brush core with pin in driver on drive belt side (operator's left) and push brush onto driver. Then snap bearing end (opposite end) of brush into retaining clip.
8. Check cooling air screen (located on frame behind left wheel) for lint or debris.
9. Check float and shut-off screen and clean as necessary.

NOTE: Always store machine with brush in "Store" position.

MAINTENANCE

⚠ WARNING:

Only qualified maintenance personnel are to perform the following repairs.

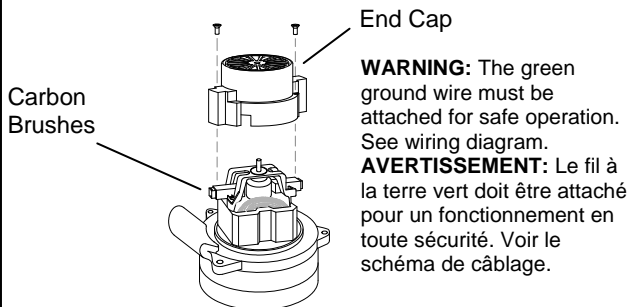
⚠ AVERTISSEMENT:

Seul le personnel d'entretien qualifié peut effectuer des réparations.

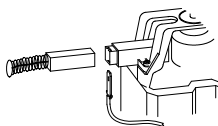
VACUUM MOTOR REPLACEMENT

1. Turn off all switches and unplug machine.
2. Remove recovery tank.
3. Remove the (2) screws that fasten the solution tank to the frame, and tilt tank back to expose the inside of the frame.
4. Locate the vacuum motor wires and disconnect at the connector. Close the solution tank.
5. Remove the (6) screws holding the vacuum motor cover (p/n 27809) to the solution tank.
6. Remove the vacuum motor.
7. Reverse process to install vacuum motor.

Vacuum Motor Carbon Brushes Replacement (Windsor)

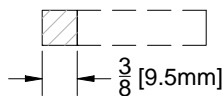


If armature commutator is grooved, extremely pitted or not concentric, the motor will need to be replaced or sent to a qualified service center.



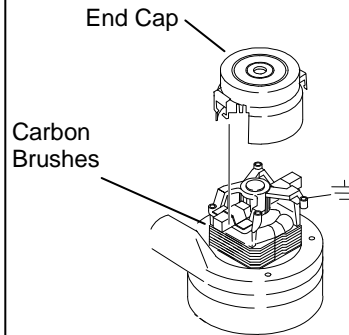
Important:

These brushes wear quicker as the length shortens due to increased heat. Spring inside brush housing will damage motor if brushes are allowed to wear away completely.

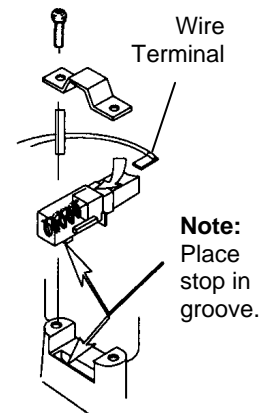


Periodically check the length of the carbon brushes. Replace both carbon brushes when either is less than 3/8" (9.5mm) long.

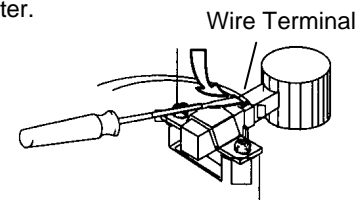
Vacuum Motor Carbon Brushes Replacement (Ametek)



Note: When replacing carbon brushes loosen wire terminal **BEFORE** removing screws on bracket.

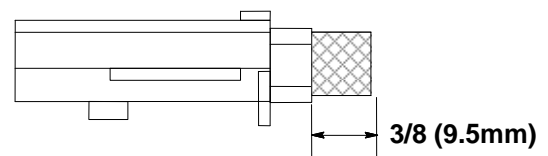


If armature commutator is grooved, extremely pitted or not concentric, the motor will need to be replaced or sent to a qualified service center.



Important:

These brushes wear quicker as the length shortens due to increased heat. Spring inside brush housing will damage motor if brushes are allowed to wear away completely.



Periodically check the length of the carbon brushes. Replace both carbon brushes when either is less than 3/8" (9.5mm) long.

⚠ WARNING:

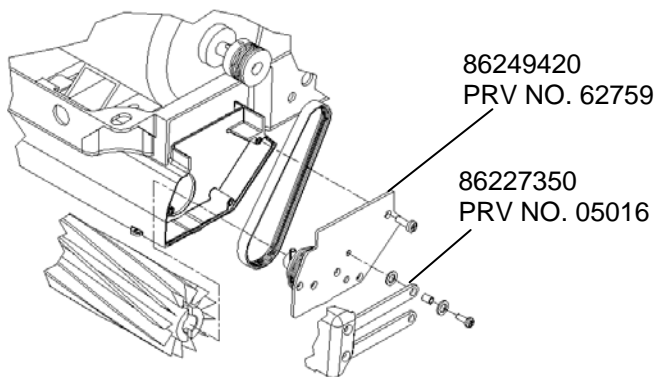
Only qualified maintenance personnel are to perform the following repairs.

⚠ AVERTISSEMENT:

Seul le personnel d'entretien qualifié peut effectuer des réparations.

BELT REPLACEMENT

1. Turn off all switches and unplug machine.
2. Remove recovery tank and brush.
3. Remove the (2) screws that fasten the solution tank to the frame, and tilt tank back to expose the inside of the frame.
4. Loosen the (4) screws that hold the brush motor in place and slide motor forward to release tension in belt.
5. Remove the (2) screws that fasten the vacuum shoe links (p/n 05016) to the brush housing.
6. Remove the (3) screws that fasten the side plate (p/n 62759) to the brush housing to remove belt.
NOTE: All components associated with driving the brush will come out with the side plate.
7. Reverse process to install belt.



MAINTENANCE

⚠ WARNING:

Only qualified maintenance personnel are to perform the following repairs.

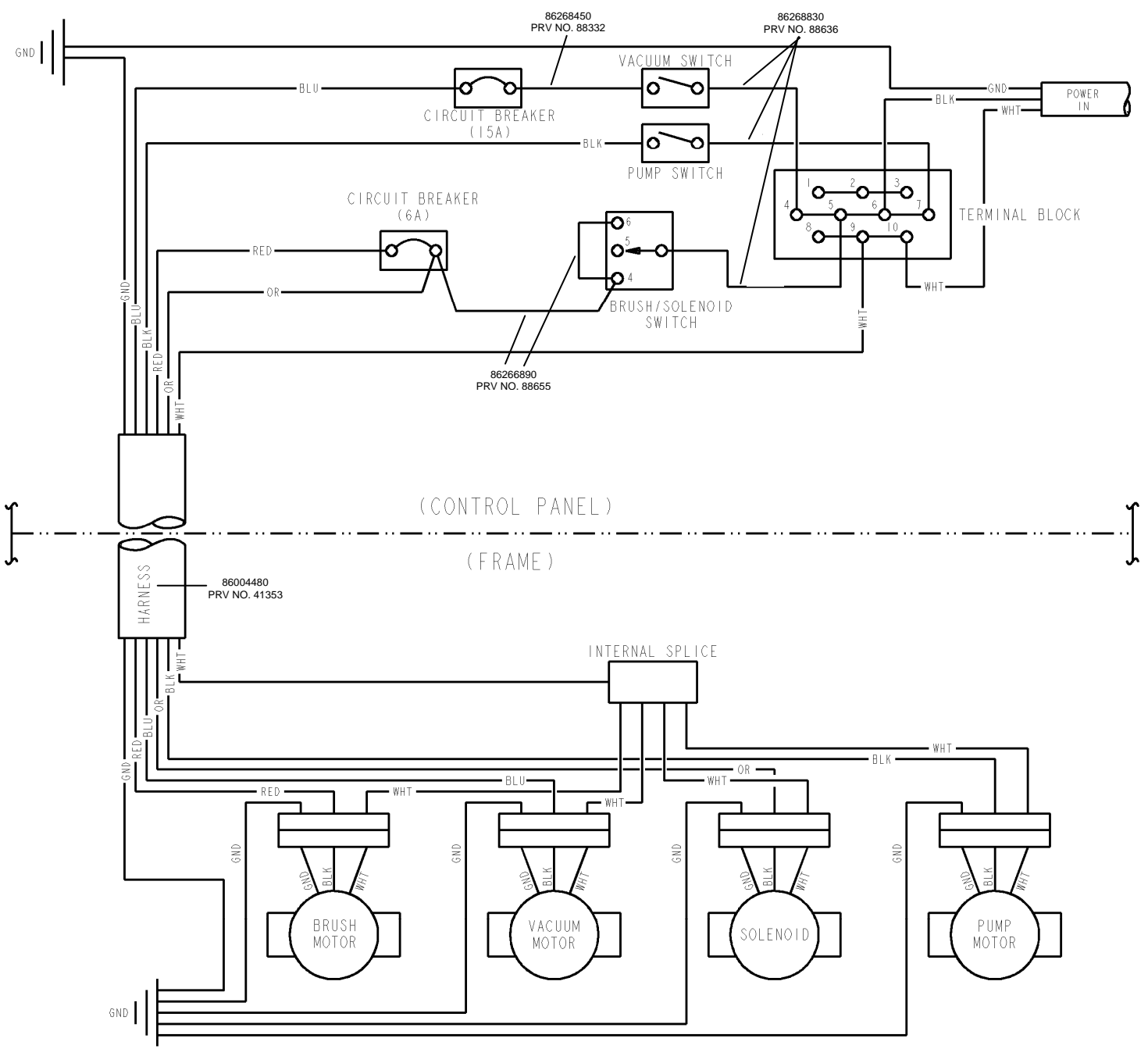
⚠ AVERTISSEMENT:

Seul le personnel d'entretien qualifié peut effectuer des réparations.

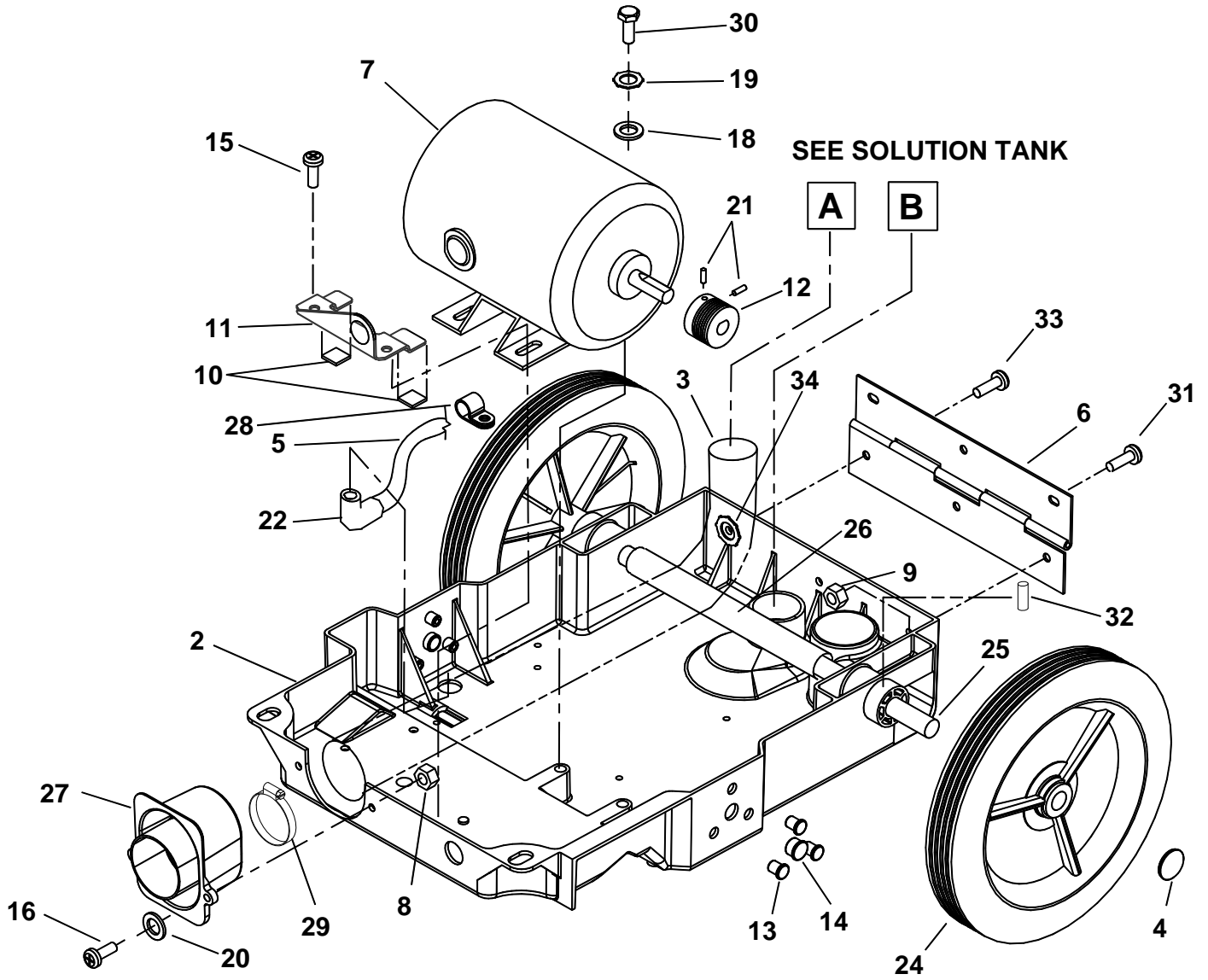
SOLUTION PUMP REPLACEMENT

1. Turn off all switches and unplug the machine.
2. Remove recovery tank.
3. Remove the (2) screws that fasten the solution tank to the frame, and tilt tank back to expose the inside of the frame.
4. Remove solution hoses from fittings in pump.
5. Remove the (2) screws that fasten the pump to the frame.
6. Reverse process to install pump.

WIRING DIAGRAM



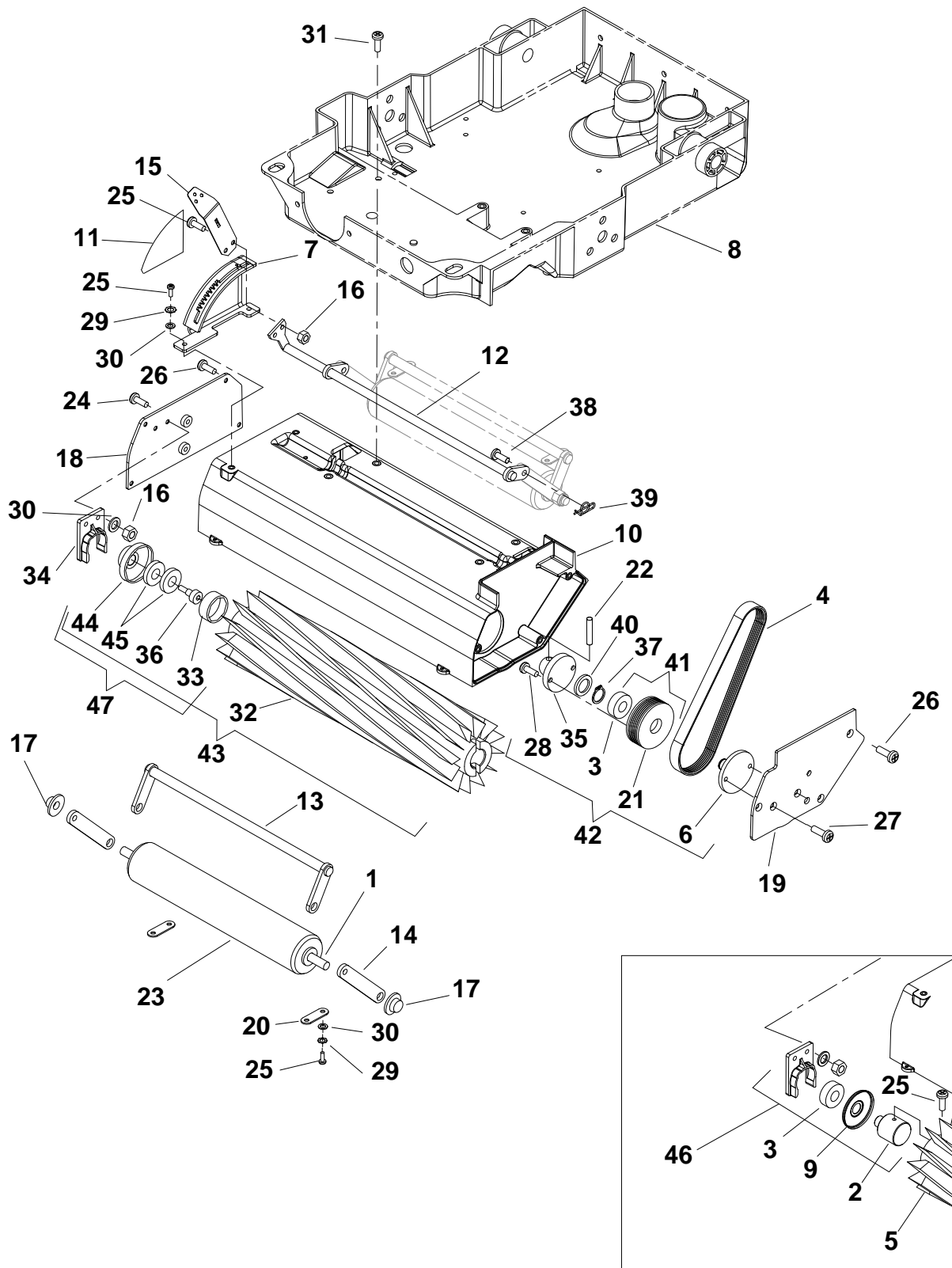
FRAME ASSEMBLY



FRAME ASSEMBLY

REF	PART NO.	PART NO.	QTY	DESCRIPTION	SERIAL NO. FROM	NOTES:
1		OPEN	-	-		
2	86003620	34341	1	FRAME, CLP FAMILY		
3	86004340	39528	1	HOSE ASM, 1.5 BLK VAC X 15.5		
4	86001660	41236	2	HUBCAP, 5/8" SHAFT		
5	86004480	41353	1	HARNESS, MAIN, CDT		
6	86239610	41354	1	HINGE, TANK TO FRAME		
7	86026150	53640	1	MOTOR ASM, BRUSH CLP FAMILY		
8	86005640	57030	2	NUT, 10-32 HEX NYLOCK		
9	86005810	57245	3	NUT, 1/4-20 HEX NYLOCK SS		
10	86198530	99809	2	FOAM TAPE, 1/8 THK X 3/4 1SDA		
11	86249430	62761	1	PLATE, BRUSH MTR CLAMP	100046610	
12	86006020	64099	1	PULLEY, 1.4 OD, 6GR, MICRO-V		
13	86250130	66282	6	PLUG, HOLE, .375" BLK		
14	86250140	66288	2	PLUG, 9/16 OD BLK NYLON		
15	86006580	70085	2	SCR, 1/4-20 X 1/2 PPHMS SS		
16	86273980	70066	2	SCR, 10-32 X 3/4 PPHMS		
17		OPEN	-	-		
18	86010630	87013	2	WASHER, 1/4 ID X 5/8 OD SS		
19	86010660	87025	2	WASHER, 1/4 LOCK EXT STAR SS		
20	86010650	87018	2	WASHER, #10 X 9/16 OD		
21	86006550	70074	2	SET SCR, 10-32 X 1/4 KCP		
22	86256190	73197	1	STRAIN RELIEF, 90 DEGREE		
23		OPEN	-	-		
24	86259960	89506	2	WHEEL, 1-15/16 X 10" HOOSIER		
25	86066230	03107	1	AXLE, 5/8 X 17.06L		
26	86134490	99667	10"	HEAT SHRINK, 3/4 ID UL/CSA		
27	86253090	73943	1	SEAL, FRAME/TANK		
28	86002370	20035	1	CLAMP, 7/16 DIA NYLON UL		
29	86233140	20041	1	CLAMP, 2.0" WORM GEAR		
30	86274760	70271	2	SCR, 1/4-20 X 1/2 HHCS PLTD		
31	86006530	70057	2	SCR, 1/4-20 X 1 PPHMS SS		
32	86272160	66052	1	PIN, ROLL 1/8" X 1.0"L		
33	86276610	70697	1	SCR, 1/4-20 X 1.25 PPHMS SS		
34	86005710	57105	3	NUT, 1/4-20 HEX W/ STAR WASHER		

BRUSH ASSEMBLY

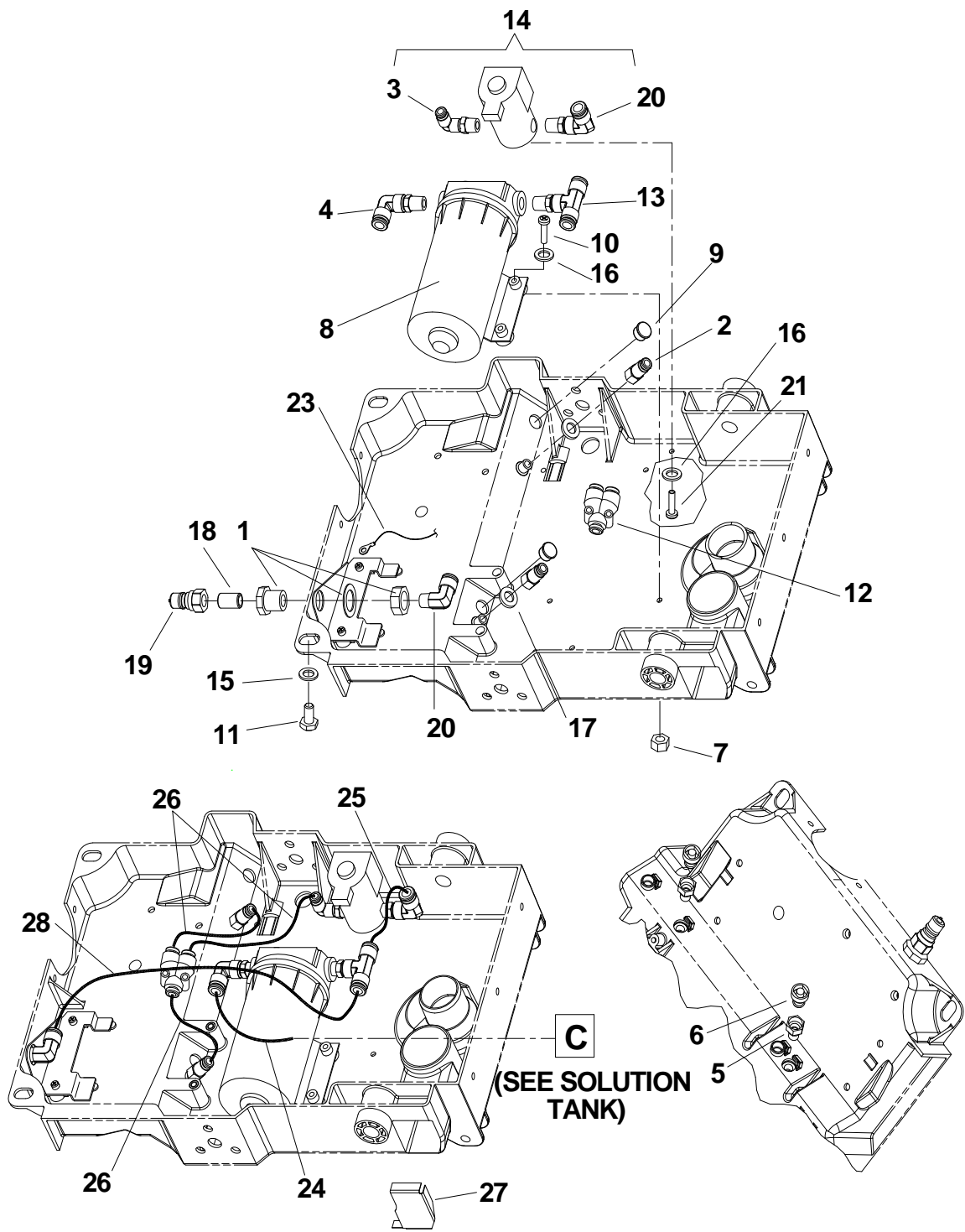


BRUSH ASSEMBLY

REF	PART NO.	PRV NO.	QTY	DESCRIPTION	SERIAL NO. FROM	NOTES:
1	86000730	03110	1	AXLE, ROLLER		
2	86227100	04084	1	ADAPTER, BRUSH BRG.		
3	86000900	09019	2	BEARING, 1.125ODX.500IDX.375		
4	86001100	11045	1	BELT, 180J6 MICRO-V		
5	86001140	12514	1	BRUSH, 15L X 3.38OD		
6	86001300	140343	1	BRKT, BRUSH PULLEY		
7	86001310	140351	1	BRKT, BRUSH HEIGHT		
8	86003620	34341	REF	FRAME, CLP FAMILY		
9	86004060	36192	2	GUARD, THREAD		
10	86004470	41345	1	HOUSING, BRUSH 15"		
11	86004980	50998	1	LABEL, BRUSH HEIGHT		
12	86093080	51311	1	LINKAGE, ASM, BRUSH HEIGHT		
13	86005110	51312	1	LINKAGE ASM, ROLLER SUPPORT		
14	86005120	51314	2	LINK, ROLLER, FRONT		
15	86005130	51317	1	LEVER, HEIGHT ADJUSTMENT		
16	86005640	57030	4	NUT, 10-32 HEX NYLOCK		
17	86005850	57271	2	NUT, 3/8 DIA CAP, TYPE PUSH PLT		
18	86249410	62758	1	PLATE, BRUSH HOUSING RH		
19	86249420	62759	1	PLATE, BRUSH HOUSING LH		
20	86264700	62762	2	PLATE, AXLE RETAINER		
21	86250680	64098	1	PULLEY, 2.2 OD, 6GR, MICRO-V		
22	86006220	66192	1	PIN, ROLL 1/4 X 1.25L		
23	86006430	67411	1	ROLLER, 1.9 DIA X 10.5 LG		
24	86006510	70043	2	SCR, 10-32 X 5/8 PFHMS		
25	86006590	70088	6	SCR, 10-32 X 1/2 PPHMS SS DL		
26	86006650	70177	7	SCR, 10-32 X 1/2 FHMS SS		
27	86006700	70232	2	SCR, 10-32 X 3/8 FHMS SS		
28	86275530	70497	2	SCR, #10-24 X 1/2 SHCS		
29	86010640	87016	4	WASHER, #10 LOCK EXT STAR SS		
30	86010650	87018	6	WASHER, #10 X 9/16 OD		
31	86007030	70675	4	SCR, 1/4-20 X.5/8 THMS PLTD NP		
32	86230620	12524	1	BRUSH, 15 L X 3.35 OD G2	1000090563	
33	86251710	67467	1	RING, TOLERANCE 7/8	1000090563	
34	86003070	27805	1	CLIP, BEARING		
35	86003370	29157	1	DRIVER, BRUSH		
36	86278130	70737	1	SHLDR BOLT, 3/8 OD X 3/8 L SS NP	1000090563	
37	86272770	67094	1	RING, 1/2 EXT. SNAP		
38	86272510	66310	2	PIN, CLEVIS 1/4 X 1/2 PLTD		
39	86008650	80604	2	COTTER, 1/4" RING		
40	86342240	-	1	SPACER, .81 X 1.06 X .125		
41	86006030	64102	1	PULLEY ASM, BRUSH		
42	86003390	29208	1	DRIVER ASM, BRUSH		
43	86001140	12514	1	BRUSH ASM, 15 IN		
44	86227150	05158	1	ADAPTER, BRUSH BRG. DIE CAST	1000090563	
45	86228890	09137	2	BEARING, R6 3/8 ID	1000090563	
46	86028010	47383	1	BRUSH BEARING ASM.		
47	86004750	47416	REF	KIT, BRNG/ADPTR EXTRCTR		

PUMP ASSEMBLY

PRIOR TO SERIAL NO. 1000166663

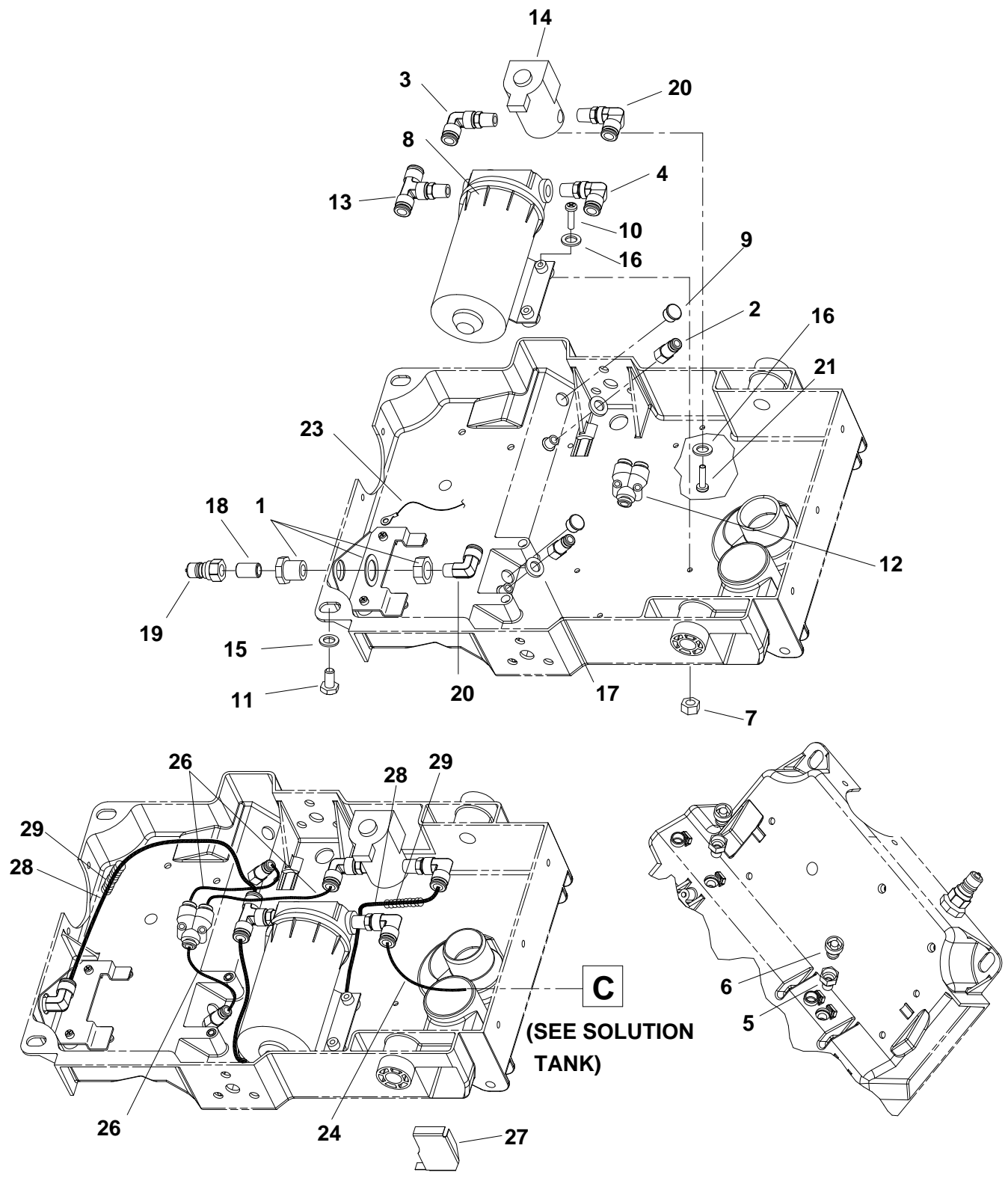


PUMP ASSEMBLY

REF	PART NO.	PRV NO.	QTY	DESCRIPTION	SERIAL NO. FROM	NOTES:
1	86002470	22072	1	COUPLING, 1/4 ANCHOR W/1" HEX		
2	86002480	22090	2	CONNECTOR, 1/8FPT X 1/4 TUBEQC		
3	86003470	31072	1	ELBOW, SWIVEL, 1/4MPTX1/4TUBE		
4	86003480	31073	1	ELBOW, SWIVEL, 1/4MPTX3/8TUBEQC		
5	86004570	44067	2	JET BODY, MINI PROMAX BODY		
6	86004580	44068	2	JET, MINI PROMAX 9504		
7	86005640	57030	2	NUT, 10-32 HEX NYLOCK		
8	86026380	65200	1	PUMP ASM, 115V 73 PSI W/CONN	1000029065	
9	86250140	66288	2	PLUG, 9/16 OD BLK NYLON		
10	86006830	70386	2	SCR, 10-32 X 1.0 PPHMS		
11	86273750	70011	2	SCR, 1/4-20 X 5/8 HHCS SS		
12	86003640	34355	1	FITTING, 1/4 TUBE, "Y", QC		
13	86008370	78420	1	TEE, 1/4 MPT X 3/8 TUBE, QC		
14	86026940	84160	1	VALVE ASM, SOLENOID CLP FAMILY		
15	86010810	87191	2	WASHER, 1/4"IDX1.0OD. FLAT SS		
16	86010650	87018	4	WASHER, #10 X 9/16 OD		
17	86010820	87192	2	WASHER, 7/16 X 3/4 X .19RUBBER		
18	86005590	56014	1	NIPPLE, 1/4 CLOSE		
19	86005580	56012	1	NIPPLE, 1/4 FPT QD		
20	86003500	31076	2	ELBOW, 1/4 MPT X 3/8 TUBE, QC		
21	86274290	70162	2	SCR, 10-32 X 3/8 PPHMS SS		
22		-	-	OPEN		
23	86267400	880278	1	WIRE, 22" GRN/18 76011 X 76011	1000046610	
24	86281890	39529	1	HOSE, 3/8 URETHANE X 29"		
25	86004350	39530	1	HOSE, 3/8 NYLON X 6"		
26	86281900	39531	3	HOSE, 1/4 URETHANE X 6"		
27	86253020	73963	1	SCREEN, INTAKE		
28	86004400	39591	1	HOSE, 3/8 ID NYL11 YLW X 29"		

PUMP ASSEMBLY

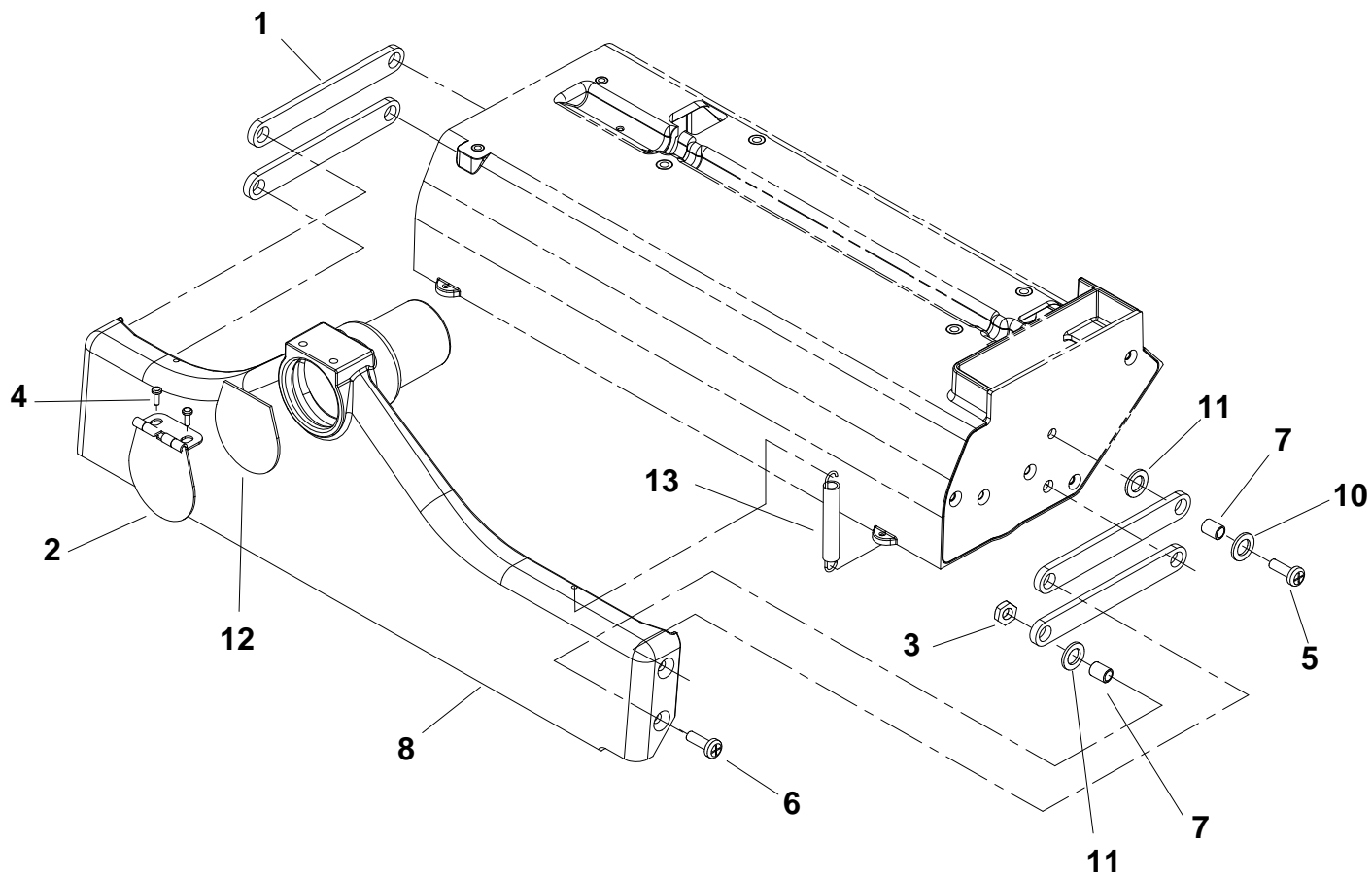
FROM SERIAL NO: 1000166663



PUMP ASSEMBLY

REF	PART NO.	PRV NO.	QTY	DESCRIPTION	SERIAL NO. FROM	NOTES:
1	86032470	22072	1	COUPLING, 1/4 ANCHOR W/1" HEX		
2	86002480	22090	2	CONNECTOR, 1/8FPT X 1/4 TUBEQC		
3	86003470	31072	1	ELBOW, SWIVEL, 1/4MPTX1/4TUBE		
4	86003490	31074	1	ELBOW, SWIVEL, 3/8MPTX3/8TUBEQC		
5	86004570	44067	2	JET BODY, MINI PROMAX BODY		
6	86004580	44068	2	JET, MINI PROMAX 9504		
7	86005640	57030	2	NUT, 10-32 HEX NYLOCK		
8	86026410	65257	1	PUMP ASM, 120V SHURFLO		
9	86250140	66288	2	PLUG, 9/16 OD BLK NYLON		
10	86274410	70195	2	SCR, 10-32 X 1.25 PPHMS SS		
11	86273750	70011	2	SCR, 1/4-20 X 5/8 HHCS SS		
12	86003640	34355	1	FITTING, 1/4 TUBE, "Y", QC		
13	86008360	78419	1	TEE, 3/8 MPT X 3/8 TUBE, QC		
14	86258900	84179	1	VALVE ASM, 120V CLP FAMILY		
15	86010810	87191	2	WASHER, 1/4"IDX1.0OD. FLAT SS		
16	86010650	87018	4	WASHER, #10 X 9/16 OD		
17	86010820	87192	2	WASHER, 7/16 X 3/4 X .19RUBBER		
18	86247750	56055	1	NIPPLE, 1/4 BSPT X 1/4 NPT HEX		
19	86234560	22097	1	COUPLER, 1/4 FPT X MINI QC		
20	86003500	31076	2	ELBOW, 1/4 MPT X 3/8 TUBE, QC		
21	86006590	70088	2	SCR, 10-32 X 1/2 PPHMS SS		
22		OPEN	-	-		
23	86267400	880278	1	WIRE, 22" GRN/18 76011 X 76011		
24	86282340	39720	1	HOSE, 3/8 OD X 1/4 ID URTHN X 22"		
25		OPEN	-	-		
26	86281900	39531	3	HOSE, 1/4 ID NYLON X 5"		
27	86253020	73963	1	SCREEN, INTAKE		
28	86282350	39721	2	HOSE, 3/8 ID NYLON YLW X 17"		
29	86279930	29277	2	DUCT, 1/2 ID SPLT FLX X 16"		

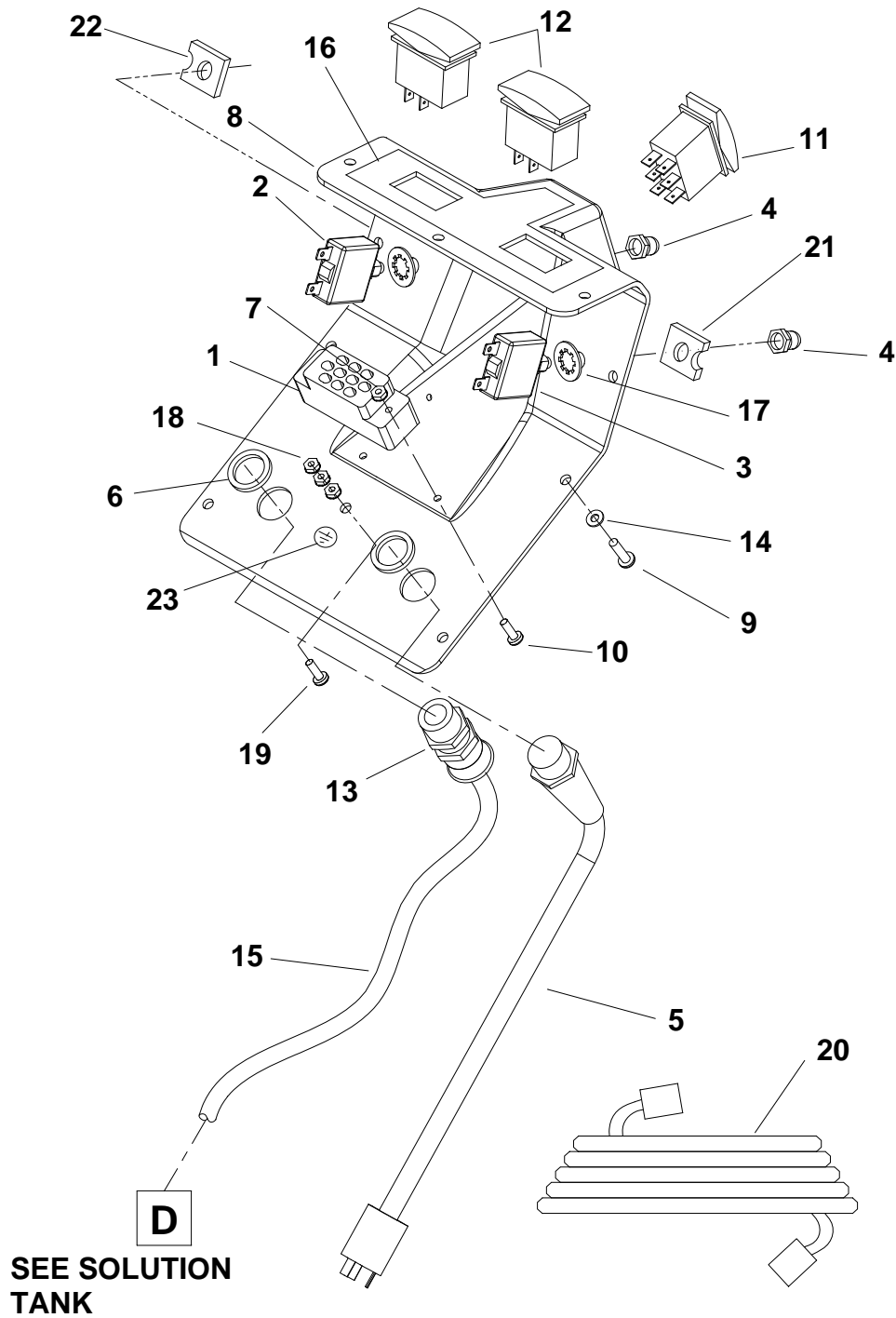
VACUUM SHOE ASSEMBLY



VACUUM SHOE ASSEMBLY

REF	PART NO.	PRV NO.	QTY	DESCRIPTION	SERIAL NO. FROM	NOTES:
1	86227350	05016	4	ARM, VAC SHOE PARALLEL		
2	86234760	27674	1	COVER, ACCESSORY PORT		
3	86005810	57245	4	NUT, 1/4-20 HEX NYLOCK SS		
4	86006790	70351	2	SCR, 10-32 X 3/8 HHTR W/STAR		
5	86275120	70360	4	SCR, 1/4-20 X.75 PPHMS PHIL		
6	86006840	70390	4	SCR, 1/4-20 X 1 FHCS PLTD		
7	86008130	73958	8	SPACER, 3/8ODX.058WX.2814,CRS		
8	86010620	85039	1	VAC SHOE, 15"		
9		OPEN	-	-		
10	86010630	87013	4	WASHER, 1/4 ID X 5/8 OD SS		
11	86010700	87074	8	WASHER, WAVE 3/8ID X3/4D X.125		
12	86003780	35171	1	GASKET, ACCESSORY PORT		
13	86008120	73955	2	SPRING, EXT .38D X2.75L X.055W		

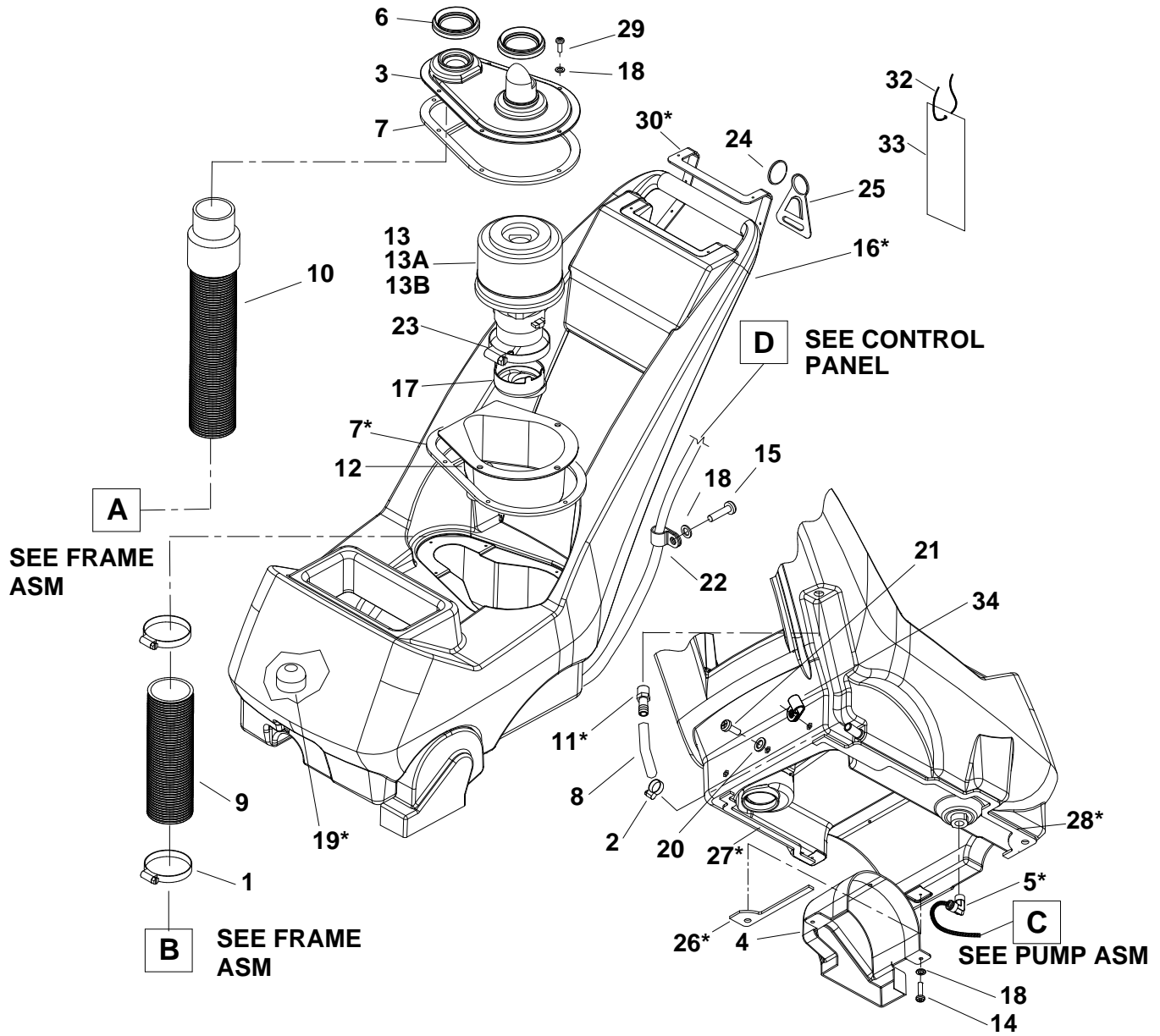
CONTROL PANEL ASSEMBLY



CONTROL PANEL ASSEMBLY

REF	PART NO.	PRV NO.	QTY	DESCRIPTION	SERIAL NO. FROM	NOTES:
1	86001240	14020	1	TERMINAL BLOCK, 115V (3-4-3)		
2	86001980	14700	1	BREAKER, 15A 250VAC 50VDC		
3	86230210	14832	1	BREAKER, 6A VDE CIRCUIT		
4	86002010	14942	2	BOOT, 3/8 CIRCUIT BREAKER		
5	86234320	23679	1	CORD ASM, 14/3 X 22" YLW		
6	86005670	57040	2	NUT, 1/2 NPT CONDUIT		
7	86005760	57116	2	NUT, 6-32 W/STAR WASHER PLTD		
8	86064400	61348	1	PANEL, CADET CONTROL		
9	86006950	70532	9	SCR, 10-32 X 1/2 PPHMS BLK NP	1000032157	
10	86006710	70235	2	SCR, 6-32 X 1.0 PH BLK NYLON		
11	86007120	72126	1	SWITCH, DPDT 3-POSITION ROCKER		
12	86007140	72130	2	SWITCH, SPST 2-POSITION ROCKER		
13	86256240	73505	1	STRAIN RELIEF, 1/2 NPT TRUMPET		
14	86010800	87189	9	WASHER, .2IDX.500 BLK SS		
15	86004480	41353	REF	HARNESS, MAIN, CDT		
16	86242720	500180	1	LABEL, CONTROL PANEL, CDT		
17	86010750	87100	2	WASHER, 3/8 ID INT.LOCK THIN		
18	86005700	57104	3	NUT, 10-32 W/STAR WASHER PLTD		
19	86006830	70386	1	SCR, 10-32 X 1.0 PPHMS		
20	86234110	23086	1	CORD SET, 14/3 SJTW-A X 50' YLW		
21	86242400	500077	1	LABEL, CIRCUIT BREAKER BRUSH		
22	86242410	500078	1	LABEL, CIRCUIT BREAKER VAC		
23	86245040	50279	1	LABEL, GROUND SYMBOL		

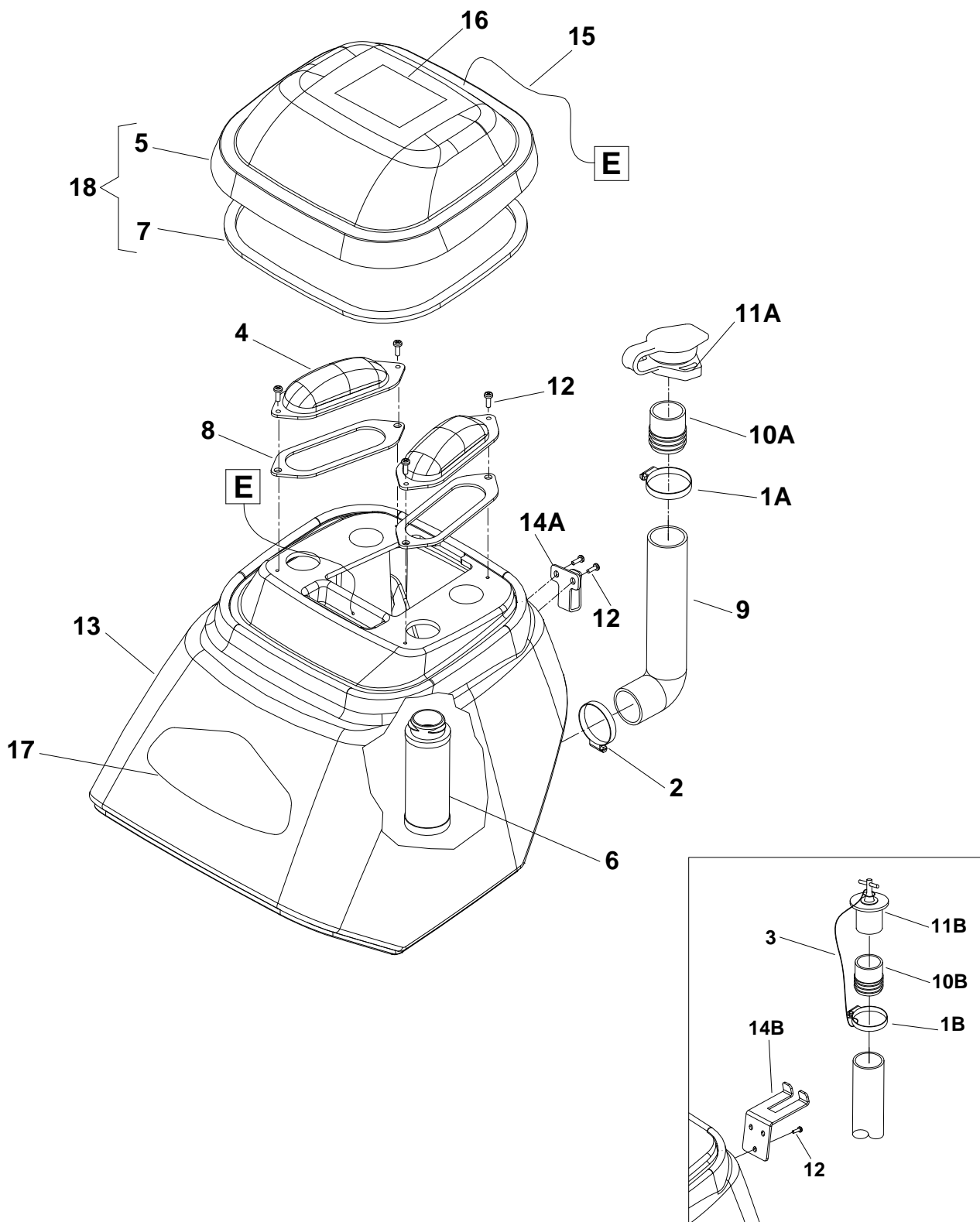
SOLUTION TANK ASSEMBLY



SOLUTION TANK ASSEMBLY

REF	PART NO.	PRV NO.	QTY	DESCRIPTION	SERIAL NO. FROM	NOTES:
1	86233140	20041	3	CLAMP, 2.0" WORM GEAR		
2	86233150	20042	1	CLAMP, 3/8 HOSE (D-SLOT)		
3	86003080	27809	1	COVER, VAC MOTOR		
4	86003090	27810	1	COVER, BELT		
5	86235500	31081	1	ELBOW, 3/8 MPT X 3/8 TUBE, PLASTIC		
6	86003790	35175	2	GASKET, TANK TO VAC COVER		
7	86003920	35231	2	GASKET, VAC COVER (CLP FAMILY)		
8	86281880	39526	1	HOSE, 1/2 CLEAR X 12		
9	86240009	39527	1	HOSE, 1.5 BLK VAC X 3.0		
10	86004340	39528	REF	HOSE ASM, 1.5 BLK VAC X 15.5		
11	86001590	40049	1	HOSEBARB, 3/8MPT X 1/2 NYLON		
12	86240980	41348	1	HOUSING, VAC MOTOR		
13	86026880	53789	1	VAC MOTOR ASM, CLP FAMILY		
13A	86135340	14258		BRUSH SET, 120V 5.7 VAC, AMETEK	*	SERVICE ONLY
13B	86135320	140687		BRUSH SET, 120V VAC, WINDSOR	*	SERVICE ONLY
14	86006600	70114	2	SCR, #10 X 3/4 PPHST TYPE B		
15	86006590	70088	2	SCR, 10-32 X 1/2 PPHMS SS	1000032157	
16	86032240	75257	1	TANK, CDT SOLUTION		
17	86259060	85037	1	VENT, COOLING AIR SMALL		
18	86010650	87018	10	WASHER, #10 X 9/16 OD		
19	86007970	73864	1	STRAINER, 3/8 IN. NPT 60 MESH		
20	86010630	87013	3	WASHER, 1/4 ID X 5/8 OD SS		
21	86006580	70085	3	SCR, 1/4-20 X 1/2 PPHMS SS DL		
22	86078950	20035	2	CLAMP, 7/16 DIA NYLON UL		
23	86233260	20092	1	CLAMP, 3.5" WORM GEAR		
24	86272840	67147	1	RING, 2" DIA SPLIT		
25	86256170	73169	1	STRAIN RELIEF, CORD HOOK		
26	86003950	35236	1	GASKET, TANK, L-F		
27	86003960	35237	1	GASKET, TANK, L-R		
28	86003970	35238	1	GASKET, TANK, RH		
29	86275690	70525	6	SCR, #10 X 1.0 PPHST TYPE B		
30	86003940	35235	1	GASKET, CDT PANEL		
31	86026660	75276	1	TANK ASM, SOLUTION CDT7		* ITEMS
32	86002870	27417	1	CORD, 99807 1/8 X 12"		
33	86232280	500012	1	CARD, INSTRUCTION CDT7		
34	86177090	03-000261	1	CLAMP, CABLE 1/2 ID 1/4BLT		

RECOVERY TANK ASSEMBLY



RECOVERY TANK ASSEMBLY

REF	PART NO.	PRV NO.	QTY	DESCRIPTION	SERIAL NO. FROM	NOTES:
1A	86002400	20064	1	CLAMP, 2.0" WORM GEAR X .312	1000083443	
1B	86002350	20002	1	CLAMP, 2.0" WORM GEAR		
2	86233140	20041	1	CLAMP, 2.0" WORM GEAR		
3	86008400	78499	1	CORD, DRAIN HOSE		
4	86003110	27816	2	COVER, REC. TANK		
5	86235280	28060	1	DOME, CLP FAMILY		
6	86003630	34351	1	FLOAT SHUT-OFF		
7	86003910	35230	1	GASKET, DOME		
8	86003930	35232	2	GASKET, PORT COVER		
9	86004200	39353	1	HOSE, 1.5 X 12.0 DRAIN		
10A	86004510	41391	1	HOSE, INSERT	1000083443	
10B	86004450	40019	1	HOSEBARB, 1.5 DOUBLE MCHD		
11A	86004500	41390	1	HOSE, CAP	1000083443	
11B	86006240	66227	1	PLUG, DRAIN HOSE		
12	86006600	70114	6	SCR, #10 X 3/4 PPHST TYPE B		
13	86032250	75258	1	TANK, CDT RECOVERY		
14A	8001370	140408	1	BRKT, HOSE HOOK	1000083443	
14B	86001190	140133	1	BRKT, RECOVERY HOSE MTG		
15	86002870	27417	1	CORD, 99807 1/8 X 12"		
16	86242230	500009	1	LABEL, WARNING		
17	86245940	50995	1	LABEL, CADET MAIN		
18	86003330	28061	1	DOME ASM, CLP FAM		

SUGGESTED SPARE PARTS

PART NO.	PRV NO.	DESCRIPTION	SERIAL # FROM	NOTES:
86001140	12514	BRUSH, ASM, 15 IN		
86001100	11045	BELT, 180J6 MICRO-V		
86000900	09019	BEARING, 1.125ODX.500IDX.375		
86004570	44067	JET BODY, MINI PROMAX BODY		
86004580	44068	JET, MINI PROMAX 9504		
86026410	65257	PUMP ASM, 120V SHURFLO	1000166663	
86258900	84179	VALVE ASM, 120V CLP FAMILY	1000166663	
86003780	35171	GASKET, ACCESSORY PORT		
86001980	14700	BREAKER, 15A 250VAC 50 VDC		
86230210	14832	BREAKER, 6A VDE CIRCUIT		
86007140	72130	SWITCH, SPST 2-POSITION ROCKER		
86007120	72126	SWITCH, DPDT 3-POSITION ROCKER		
86026880	53789	VAC MOTOR ASM, CLP FAMILY		
86007970	73864	STRAINER, 3/8 IN. NPT 60 MESH		
86003630	34351	FLOAT, SHUT-OFF		
86003330	28061	DOME ASM, CLP FAM		
86006240	66227	PLUG, DRAIN HOSE		
86135340	14258	BRUSH SET, 120V 5.7 VAC, AMETEK	*	
86135320	140687	BRUSH SET, 120V VAC, WINDSOR	*	